

2025

WordPress
Managed Hosting
Industry Report:

The Performance Results Revealed

Compare Real Test Data of the
Top Managed WordPress Hosts



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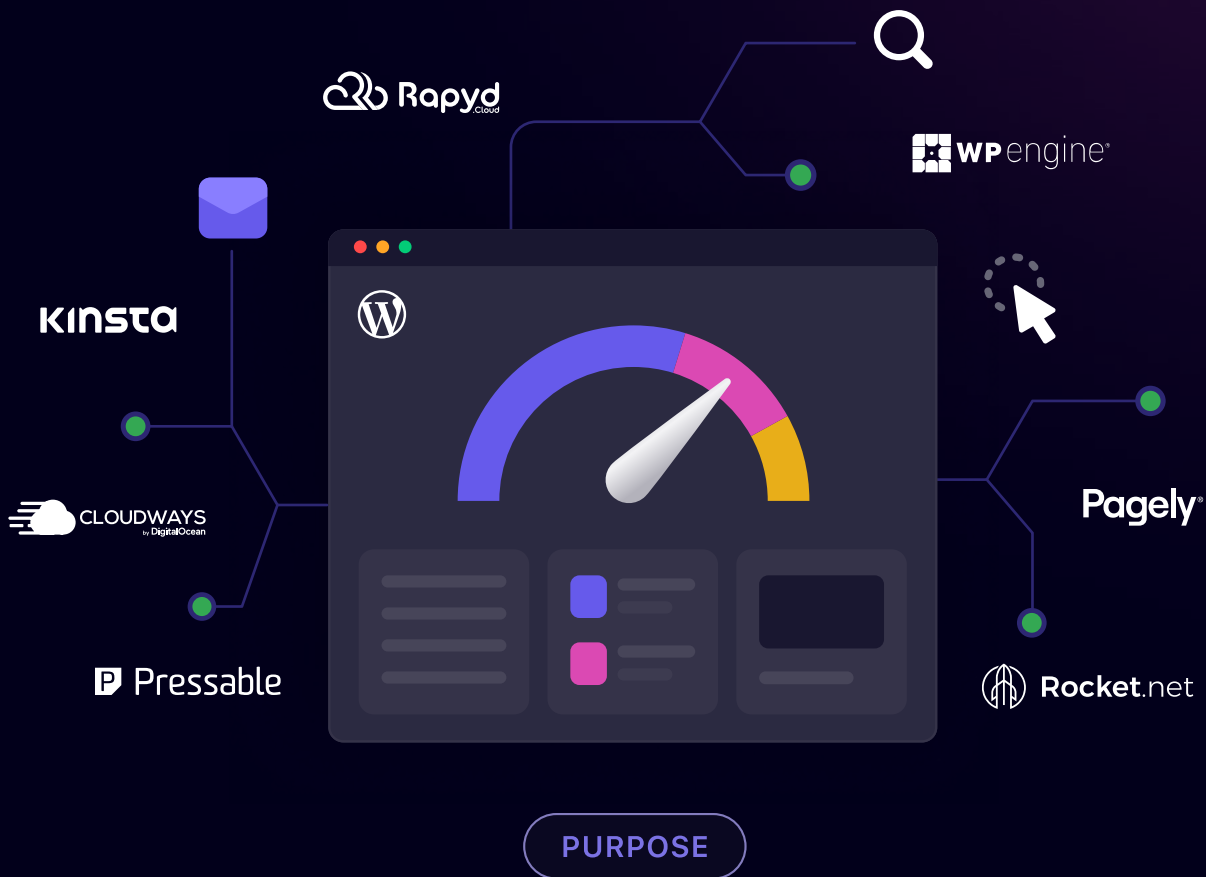
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"Illuminating Performance Across Hosting Providers"

In an ever-evolving digital landscape, the performance of your website or app is not just a feature – it's a necessity. This report is meticulously crafted with the goal of shedding light on the varied performance levels across different managed hosting providers. Our aim is to empower you, the reader, with comprehensive, unbiased insights, enabling you to make an educated decision about your hosting choice.

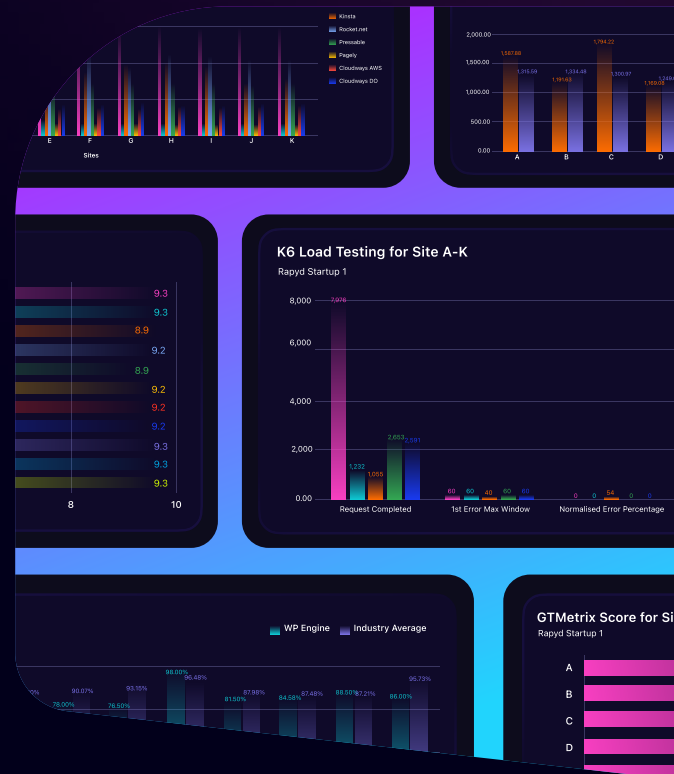
We understand that each website or app has unique needs, and performance can be a pivotal factor in their success. To ensure a fair and thorough evaluation, we have rigorously tested a wide spectrum of hosting plans from various providers, each at different price points. By presenting these findings in a clear and unbiased manner, we intend to help you identify a hosting solution that not only aligns with your performance requirements but also supports the seamless growth and scalability of your online presence.

Our commitment to impartiality and detailed analysis ensures that every aspect of hosting performance is considered, providing you with a reliable resource to guide your hosting decisions.

Executive Summary

Overview: A concise summary highlighting key findings, insights, and the value of the report to the reader.

This report provides a comprehensive analysis of multiple WordPress hosting providers, evaluating their performance across various critical metrics, including server performance benchmarks, WordPress performance execution times, queries per second, and K6 load testing. The key findings reveal significant differences in how these providers manage high traffic, dynamic content, and complex configurations.



The average GTMetric performance scores across all providers range from 74.33% to 100%, reflecting varying levels of optimization and speed. Execution times (ET) for WordPress performance tests show a broad spectrum, with averages ranging from 5.47 to 22.10 seconds, indicating different capabilities in handling server-side processes. Queries per second (QPS), a crucial metric for dynamic content handling, also vary significantly, with averages from 275 to over 3,000 QPS, highlighting each provider's capacity to manage concurrent requests.

In K6 load testing, the point at which providers begin to show errors (First Error Max Window) varies, with some handling up to 60 seconds under load before errors occur, while others start to fail much earlier. Normalized requests per second, an indicator of how efficiently a provider handles intense load over time, range from as low as 0.05 to over 450 requests per second.

The report offers valuable insights and recommendations to help readers select the most suitable hosting provider based on their specific needs. By understanding the strengths and weaknesses of each hosting option, site owners can make informed decisions that align with their traffic demands and complexity, ensuring optimal performance and a better user experience for their WordPress sites.

What is a Dynamic WordPress Site?

Let's clarify what we mean by a highly dynamic WordPress site. Essentially, every WordPress website is dynamic to some degree since its content is fetched from a database, making it adaptable and interactive. However, we reserve the term "dynamic website" for those with extensive dynamic content and complex structures. This distinction highlights the unique needs and challenges these types of sites face, distinguishing them from simpler, brochure sites or blogs.



Detailed Methodology

Introduction to Methodology

In this report, we aim to provide an unbiased, accurate, and comprehensive analysis of WordPress hosting performance. By utilizing well-known, third-party testing tools, we ensure that our methods are transparent and our results are reproducible. This section details the rigorous approach and varied tools we used to assess the performance of different WordPress hosting providers.




Website Demos and Configurations

To mimic real-world scenarios, we created multiple website demos with various configurations. These range from basic setups with the Twenty Twenty-Three Theme to more complex arrangements including combinations of BuddyBoss, LearnDash, WooCommerce, and TutorLMS.


Site A

[Basic with Twenty Twenty-Four installed →](#)

LIST OF ACTIVE PLUGINS:

-  LiteSpeed Cache
-  Object Cache Pro
-  Stop Emails






OTHER DETAILS:

-  1 user

Site B

[BuddyBoss Site with demo content →](#)














LIST OF ACTIVE PLUGINS:

-  BuddyBoss Platform
-  LiteSpeed Cache
-  Stop Emails
-  BuddyBoss Platform Pro
-  Object Cache Pro

OTHER DETAILS:

-  12 users
-  325 BuddyBoss Activities

BUDDYBOSS COMPONENTS:

-  Member Profiles
-  Forum Discussions
-  Email Invites
-  Profile Fields
-  Activity Feeds
-  Moderation
-  Account Settings
-  Media Uploading
-  Network Search
-  Notifications
-  Private Messaging
-  Social Groups
-  Member Connections

Site C

[BuddyBoss Site + App with demo content →](#)

LIST OF ACTIVE PLUGINS:

- ✔ BuddyBoss App
- ✔ BuddyBoss Platform Pro
- ✔ Object Cache Pro
- ✔ BuddyBoss Platform
- ✔ LiteSpeed Cache
- ✔ Stop Emails

OTHER DETAILS:

- ✔ 12 users
- ✔ 291 BuddyBoss Activities

BUDDYBOSS COMPONENTS:

- ✔ Member Profiles
- ✔ Forum Discussions
- ✔ Email Invites
- ✔ Profile Fields
- ✔ Activity Feeds
- ✔ Moderation
- ✔ Account Settings
- ✔ Media Uploading
- ✔ Network Search
- ✔ Notifications
- ✔ Private Messaging
- ✔ Social Groups
- ✔ Member Connections

BUDDYBOSS APP COMPONENTS:

- ✔ App pages
- ✔ In-App Purchases
- ✔ Push notification
- ✔ API Performance

Site D

[BuddyBoss Site + Learndash Site + App with demo content →](#)














LIST OF ACTIVE PLUGINS:

- ✔ BuddyBoss App
- ✔ LearnDash LMS
- ✔ Object Cache Pro
- ✔ BuddyBoss Platform
- ✔ LearnDash LMS - ProPanel
- ✔ Stop Emails
- ✔ BuddyBoss Platform Pro
- ✔ LiteSpeed Cache

OTHER DETAILS:

-  23 users
-  267 BuddyBoss Activities






BUDDYBOSS COMPONENTS:

-  Member Profiles
-  Forum Discussions
-  Email Invites
-  Profile Fields
-  Activity Feeds
-  Moderation
-  Account Settings
-  Media Uploading
-  Network Search
-  Notifications
-  Private Messaging
-  Social Groups
-  Member Connections

BUDDYBOSS APP COMPONENTS:

-  App pages
-  In-App Purchases
-  Push notification
-  API Performance








LEARNDASH:

-  26 Courses
-  259 Topics
-  4 Groups
-  143 Lessons
-  76 Quizzes

Site E

[BuddyBoss Site + LearnDash Site with demo content →](#)

LIST OF ACTIVE PLUGINS:

-  BuddyBoss Platform
-  LearnDash LMS - ProPanel
-  Stop Emails
-  BuddyBoss Platform Pro
-  LiteSpeed Cache
-  LearnDash LMS
-  Object Cache Pro

OTHER DETAILS:

- ✔ 23 users
- ✔ 278 BuddyBoss Activities

BUDDYBOSS COMPONENTS:

- ✔ Member Profiles
- ✔ Forum Discussions
- ✔ Email Invites
- ✔ Profile Fields
- ✔ Activity Feeds
- ✔ Moderation
- ✔ Account Settings
- ✔ Media Uploading
- ✔ Network Search
- ✔ Notifications
- ✔ Private Messaging
- ✔ Social Groups
- ✔ Member Connections

LEARNDASH:

- ✔ 26 Courses
- ✔ 259 Topics
- ✔ 4 Groups
- ✔ 143 Lessons
- ✔ 76 Quizzes

Site F

BuddyBoss Site + LearnDash Site + App - Large Client Site →

LIST OF ACTIVE PLUGINS:

- ✔ BB Massive Dummy Importer
- ✔ BuddyBoss Platform Pro
- ✔ LiteSpeed Cache
- ✔ BuddyBoss App
- ✔ LearnDash LMS
- ✔ Object Cache Pro
- ✔ BuddyBoss Platform
- ✔ LearnDash LMS - ProPanel
- ✔ Stop Emails

OTHER DETAILS:

- ✔ 5,123 users
- ✔ 4,530 BuddyBoss Activities

BUDDYBOSS COMPONENTS:

- ✔ Member Profiles
- ✔ Forum Discussions
- ✔ Email Invites

- ✔ Profile Fields
- ✔ Account Settings
- ✔ Notifications
- ✔ Social Groups
- ✔ Activity Feeds
- ✔ Media Uploading
- ✔ Private Messaging
- ✔ Member Connections
- ✔ Moderation
- ✔ Network Search

BUDDYBOSS APP COMPONENTS:

- ✔ App pages
- ✔ Push notification
- ✔ In-App Purchases
- ✔ API Performance

LEARNDASH:

- ✔ 31 Courses
- ✔ 157 Lessons
- ✔ 258 Topics
- ✔ 10 Quizzes
- ✔ 1 Group

Site G

BuddyBoss Site + LearnDash Site + App - Medium Sized Client Site →

LIST OF ACTIVE PLUGINS:

- ✔ BB Massive Dummy Importer
- ✔ BuddyBoss App
- ✔ BuddyBoss Platform
- ✔ BuddyBoss Platform Pro
- ✔ LearnDash LMS
- ✔ LearnDash LMS - ProPanel
- ✔ LiteSpeed Cache
- ✔ Object Cache Pro
- ✔ Stop Emails

OTHER DETAILS:

- ✔ 623 users
- ✔ 2,794 BuddyBoss Activities

BUDDYBOSS COMPONENTS:

- ✔ Member Profiles
- ✔ Profile Fields
- ✔ Forum Discussions
- ✔ Activity Feeds
- ✔ Email Invites
- ✔ Moderation

- ✔ Account Settings
- ✔ Media Uploading
- ✔ Network Search
- ✔ Notifications
- ✔ Private Messaging
- ✔ Social Groups
- ✔ Member Connections

BUDDYBOSS APP COMPONENTS:

- ✔ App pages
- ✔ In-App Purchases
- ✔ Push notification
- ✔ API Performance

LEARNDASH:

- ✔ 31 Courses
- ✔ 263 Topics
- ✔ 1 Group
- ✔ 157 Lessons
- ✔ 5 Quizzes

Site H

[Learndash Site + App with Demo Content →](#)

LIST OF ACTIVE PLUGINS:

- ✔ BuddyBoss App
- ✔ LearnDash LMS
- ✔ Object Cache Pro
- ✔ BuddyBoss Platform
- ✔ LearnDash LMS - ProPanel
- ✔ Stop Emails
- ✔ BuddyBoss Platform Pro
- ✔ LiteSpeed Cache

OTHER DETAILS:

- ✔ 23 users
- ✔ 235 BuddyBoss Activities

BUDDYBOSS COMPONENTS:

- ✔ Member Profiles
- ✔ Forum Discussions
- ✔ Email Invites
- ✔ Profile Fields
- ✔ Activity Feeds
- ✔ Moderation
- ✔ Account Settings
- ✔ Media Uploading
- ✔ Network Search

- ✔ Notifications
- ✔ Private Messaging
- ✔ Social Groups
- ✔ Member Connections

BUDDYBOSS APP COMPONENTS:

- ✔ App pages
- ✔ In-App Purchases
- ✔ Push notification
- ✔ API Performance

LEARNDASH:

- ✔ 26 Courses
- ✔ 258 Topics
- ✔ 1 Group
- ✔ 152 Lessons
- ✔ 5 Quizzes

Site 1

[Learndash Site with Demo Content →](#)

LIST OF ACTIVE PLUGINS:

- ✔ BuddyBoss Platform
- ✔ LearnDash LMS - ProPanel
- ✔ Stop Emails
- ✔ BuddyBoss Platform Pro
- ✔ LiteSpeed Cache
- ✔ LearnDash LMS
- ✔ Object Cache Pro

OTHER DETAILS:

- ✔ 23 users
- ✔ 288 BuddyBoss Activities

BUDDYBOSS COMPONENTS:

- ✔ Member Profiles
- ✔ Forum Discussions
- ✔ Email Invites
- ✔ Profile Fields
- ✔ Activity Feeds
- ✔ Moderation
- ✔ Account Settings
- ✔ Media Uploading
- ✔ Network Search
- ✔ Notifications
- ✔ Private Messaging
- ✔ Social Groups
- ✔ Member Connections

LEARNDASH:

- ✔ 26 Courses
- ✔ 152 Lessons
- ✔ 258 Topics
- ✔ 5 Quizzes
- ✔ 1 Group

Site J

[Tutor LMS Site with Demo Content →](#)

LIST OF ACTIVE PLUGINS:

- ✔ BuddyBoss Platform
- ✔ BuddyBoss Platform Pro
- ✔ LiteSpeed Cache
- ✔ Object Cache Pro
- ✔ Stop Emails
- ✔ Tutor LMS
- ✔ Tutor LMS Pro

OTHER DETAILS:

- ✔ 23 users
- ✔ 248 BuddyBoss Activities

BUDDYBOSS COMPONENTS:

- ✔ Member Profiles
- ✔ Profile Fields
- ✔ Account Settings
- ✔ Notifications
- ✔ Social Groups
- ✔ Forum Discussions
- ✔ Activity Feeds
- ✔ Media Uploading
- ✔ Private Messaging
- ✔ Member Connections
- ✔ Email Invites
- ✔ Moderation
- ✔ Network Search

TUTOR LMS:

- ✔ 26 Courses

Site K

WooCommerce Site with Demo Content →

LIST OF ACTIVE PLUGINS:

- ✔ LiteSpeed Cache
- ✔ Object Cache Pro
- ✔ Stop Emails
- ✔ WooCommerce

OTHER DETAILS:

- ✔ 12 users
- ✔ 29 Products



Hosting Plan Selection and Price Brackets

Our approach to testing involved purchasing actual hosting plans from various providers, thereby replicating a typical customer experience. To facilitate a meaningful comparison of the services offered, we categorized these hosting plans into eight distinct price levels:

LEVEL 1

\$25 to \$74

Catering to enterprise-level requirements, these plans offer top-tier performance and support for large-scale operations.

LEVEL 2

\$75 to \$149

This bracket represents a step up, targeting users who need more resources or features than the most basic plans.

LEVEL 3

\$150 to \$299

Mid-range hosting plans fall into this category, offering enhanced performance and additional features for growing websites.

LEVEL 4

\$300 to \$399

These plans are designed for more demanding sites, providing higher performance and more robust hosting capabilities.

LEVEL 5

\$400 to \$499

Approaching the premium segment, these plans offer advanced features and capabilities for high-traffic sites.

LEVEL 6

\$500 to \$999

This bracket includes high-end hosting solutions for businesses with significant online presence and performance needs.

LEVEL 7

\$1,000 to \$1,499

Catering to enterprise-level requirements, these plans offer top-tier performance and support for large-scale operations.

LEVEL 8

\$1,499 to \$2,000

The highest bracket, featuring the most premium hosting solutions for the most demanding and high-traffic websites.

Each hosting plan was selected based on its alignment with these price brackets, ensuring a fair comparison within similar cost ranges. This categorization allows us to comprehensively evaluate and compare hosting plans, providing valuable insights into what each price range offers to WordPress users.



Selection Criteria for WordPress Hosting Providers

In selecting the WordPress hosting providers for our report, we focused on well-known Managed WordPress hosting services known for their reliability and performance.

The following providers were chosen based on their market recognition and our familiarity with their services. Each provider has been tested on various levels according to their available plan offerings:

- ▶ **Rapyd:** Tested across all levels 1 through 7.
- ▶ **WP Engine:** Evaluated on levels 1 and 2.
- ▶ **Kinsta:** Assessed on levels 1, 2, 3, and 4.
- ▶ **Rocket.net:** Tested on levels 1, 2, 5, and 7.
- ▶ **Pressable:** Evaluated on levels 1, 3, and 5.
- ▶ **Pagely:** Assessed on levels 3, 4, and 5.
- ▶ **Cloudways AWS:** Three plans tested, chosen from levels 1, 2, 4, and 5.
- ▶ **Cloudways DO (DigitalOcean):** Three plans tested, chosen from levels 1, 2, and 3.

This diverse selection of providers ensures that our report covers a broad spectrum of the WordPress hosting market, from budget-friendly options to premium enterprise-level solutions. Our analysis includes a range of hosting environments and configurations, providing valuable insights for potential customers with different needs and budgets.

Testing Environments

In our comprehensive evaluation of WordPress hosting providers, we meticulously documented each hosting plan selected for testing. This documentation included the specifics of the chosen plan and server region to ensure a broad representation of hosting environments. Testing was conducted over a period of 1-2 months, with each test's date and time recorded.

Rapyd

- Plan Tested
 - ▶ Level 1 - [Startup 1](#)
 - ▶ Price: **\$119**/month (Monthly)
 - ▶ Server Region: US East, US West, and Europe
 - ▶ Level 2 - [Startup 4](#)
 - ▶ Price: **\$239**/month (Monthly)
 - ▶ Server Region: US East, US West, and Europe
 - ▶ Level 3 - [Performance 1](#)
 - ▶ Price: **\$359**/month (Monthly)
 - ▶ Server Region: US East, US West, and Europe
 - ▶ Level 4 - [Performance 3](#)
 - ▶ Price: **\$479**/month (Monthly)
 - ▶ Server Region: US East, US West, and Europe
 - ▶ Level 5 - [Performance 5](#)
 - ▶ Price: **\$599**/month (Monthly)
 - ▶ Server Region: US East, US West, and Europe
 - ▶ Level 6 - [Enterprise 4](#)
 - ▶ Price: **\$1,439**/month (Monthly)
 - ▶ Server Region: US East, US West, and Europe
 - ▶ Level 7 - [Enterprise 5](#)
 - ▶ Price: **\$1,799**/month (Monthly)
 - ▶ Server Region: US East, US West, and Europe

WP Engine

- Plan Tested
 - ▶ Level 1 - [Growth Plan](#)
 - ▶ Price: **\$92/month** (Monthly)
 - ▶ Level 2 - [Scale](#)
 - ▶ Price: **\$232/month** (Monthly)

Kinsta

- Plan Tested
 - ▶ Level 1 - [Business 1](#)
 - ▶ Price: **\$115/month** (Monthly)
 - ▶ Level 2 - [Business 2](#)
 - ▶ Price: **\$225/month** (Monthly)
 - ▶ Level 3 - [Business 3](#)
 - ▶ Price: **\$340/month** (Monthly)
 - ▶ Level 2 - [Business 4](#)
 - ▶ Price: **\$450/month** (Monthly)

Rocket.net

- Plan Tested
 - ▶ Level 1 - [Expert](#)
 - ▶ Price: **\$200/month** (Monthly)
 - ▶ Server Region: Tempe, USA

Pressable

- Plan Tested
 - ▶ Level 1 - [Pro](#)
 - ▶ Price: **\$90/month** (Monthly)

- ▶ Level 3 - [Business](#)
 - ▶ Price: **\$350**/month (Monthly)
 - ▶ Server Region: Ashburn, USA
- ▶ Level 5 - [Business 80](#)
 - ▶ Price: **\$545**/month (Monthly)
 - ▶ Server Region: Ashburn, USA

Pagely

- Plan Tested
 - ▶ Level 3 - [Performance Lite](#)
 - ▶ Price: **\$375**/month (Monthly)
 - ▶ Level 4 - [Performance](#)
 - ▶ Price: **\$499**/month (Monthly)
 - ▶ Level 5 - [Performance+](#)
 - ▶ Price: **\$999**/month (Monthly)

Cloudways AWS

- Plans Tested: Three plans selected from Levels 1, 2, 4, 5:
 - ▶ Level 1 - [AWS Medium](#)
 - ▶ Price: **\$91.84**/month (Monthly)
 - ▶ Level 2 - [AWS CO XL](#)
 - ▶ Price: **\$262.75**/month (Monthly)
 - ▶ Level 4 - [AWS CO 2XL](#)
 - ▶ Price: **\$412.81**//month (Monthly)
 - ▶ Level 5 - [AWS CO 4XL](#)
 - ▶ Price: **\$667.40**//month (Monthly)

Cloudways DO (DigitalOcean)

- **Plans Tested:** Three plans selected from Levels 1, 2, 3:
 - ▶ Level 1 - [DO8GB Premium](#)
 - ▶ Price: **\$99/month** (Monthly)
 - ▶ Level 2 - [DO16GB Premium](#)
 - ▶ Price: **\$170/month** (Monthly)
 - ▶ Level 3 - [DO48GB](#)
 - ▶ Price: **\$342/month** (Monthly)

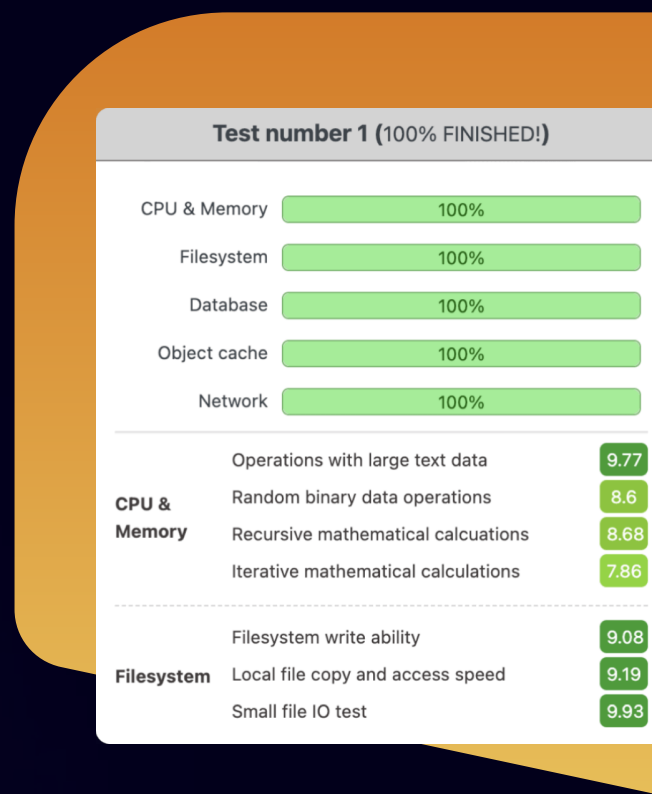
Third-Party Testing Plugins and Tools

For comprehensive testing, we employed third-party plugins such as WPBenchmark and WPerformanceTester. These tools allowed us to conduct detailed tests on CPU, memory, filesystem, and database performance. Additionally, we used the K6 tool for further performance testing, ensuring a broad and thorough evaluation of hosting capabilities.

A WPBenchmark Plugin

WPBenchmark is a comprehensive plugin designed to assess various aspects of WordPress hosting performance. [Link to plugin](#)

- **Testing Methodology:**
 - ▶ **CPU and Memory Tests:** Evaluates the CPU speed using functions that stress the processor and tests RAM speed by performing operations on large in-memory arrays.
 - ▶ **Filesystem Tests:** Includes tests for filesystem writeability and small file IO, along with file copy benchmarks.

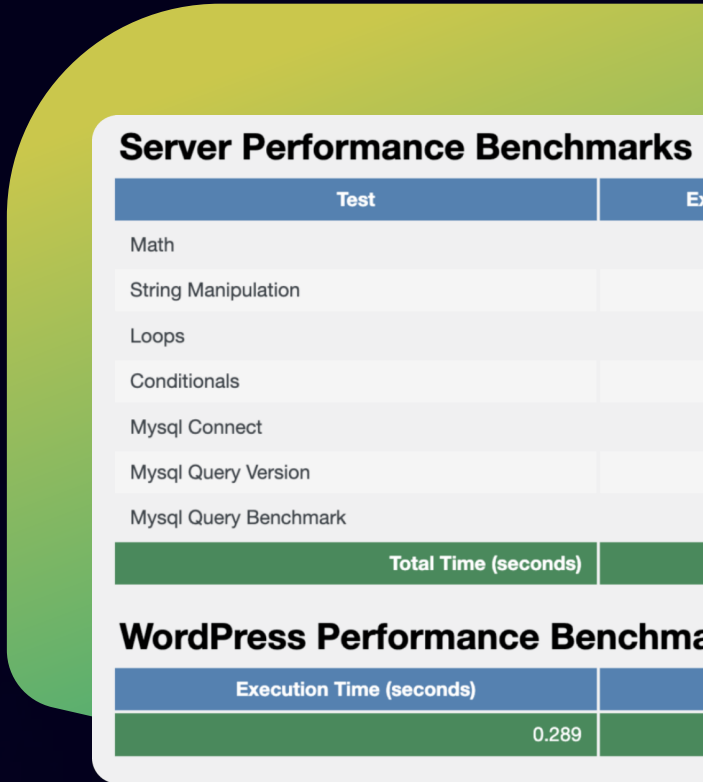


- ▶ Database Performance Tests: Involves inserting large amounts of data, running simple and complex queries to assess database efficiency.
- ▶ Network Speed Test: Measures to-server network speed by downloading a file from a global CDN.
- **What It Teaches Us:** Provides insights into the hosting server's processing power, memory efficiency, database handling capabilities, and network connectivity.

B WPerformanceTester Plugin

WPerformanceTester benchmarks server performance, particularly stressing PHP and MySQL. [Link to plugin](#)

- **Testing Methodology:**
 - ▶ Math, String Manipulation, Loops, and Conditionals: Conducts extensive tests on math functions, string operations, loop iterations, and conditional logic checks.
 - ▶ MySql and \$wpdb Tests: Tests basic MySQL functions and performs numerous operations through \$wpdb.
- **What It Teaches Us:** Sheds light on the server's capability to handle PHP and MySQL workloads, which are crucial for WordPress site functionality.

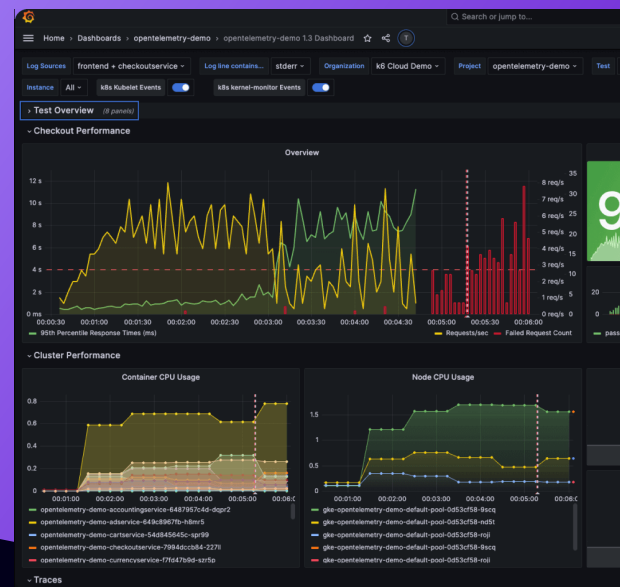


C K6 Tool

K6 is a modern load testing tool, providing insights into how hosting environments handle traffic. [Link to plugin](#)

• Testing Methodology:

- ▶ **Load Testing:** Simulates different user traffic levels to test how the server responds under varying load conditions.
- ▶ The Grafana K6 testing performed for this evaluation was designed to execute a stress test on each hosting environment to assess the individual platforms ability to cope with increasing numbers of page requests - this is largely what we know as a server's concurrent user capability.



Testing Overview

For consistency the script executed on each website is as follows:

```

import { sleep } from 'k6'
import { Rate } from 'k6/metrics'
import http from 'k6/http'

// let's collect all errors in one metric
let errorRate = new Rate('error_rate');

// See https://k6.io/docs/using-k6/options
export let options = {
  batch: 1,
  throw: true,
  stages: [
    { duration: '1m', target: 3000 },
  ],

```



```
ext: {
  loadimpact: {
    distribution: {
      Virginia: { loadZone: 'amazon:us:ashburn', percent: 10 },
      London: { loadZone: 'amazon:gb:london', percent: 10 },
      Frankfurt: { loadZone: 'amazon:de:frankfurt', percent: 10 },
      Oregon: { loadZone: 'amazon:us:portland', percent: 10 },
      Ohio: { loadZone: 'amazon:us:columbus', percent: 10 },
      Tokyo: { loadZone: 'amazon:jp:tokyo', percent: 10 },
      Sydney: { loadZone: 'amazon:au:sydney', percent: 10 },
      Mumbai: { loadZone: 'amazon:in:mumbai', percent: 10 },
      Singapore: { loadZone: 'amazon:sg:singapore', percent: 10 },
      Brazil: { loadZone: 'amazon:br:sao paulo', percent: 10 },
    },
  },
},
},
}

export default function () {
  let params = {
    headers: { 'X-CustomHeader': '1' , 'Cache-Control': 'no-cache' },
  };
  let rnd = Math.random();
  let res = http.get( http.url`https://
wordpress-1219814-4337962.cloudwaysapps.com/news-feed/?hqk=${rnd}` , params
);
  errorRate.add( res.status < 200 || res.status >= 400 );
  sleep(1);
}
```

The script is designed to generate an increasing number of page requests from multiple regions around the world over a one-minute period.

With the target goal being to start at 0 VUs (Virtual Users) in the first second and then ramp up across the minute to 3,000 VUs at the peak of the load testing run,

On all sites, the target URL is chosen to represent a common high-demand page:

- ▶ **A** - /Home page for simple WordPress site
- ▶ **D** - /News-feed/ for BuddyBoss sites - small database
- ▶ **F** - /News-feed/ for BuddyBoss sites - large database
- ▶ **J** - /Courses/ for tutorlms
- ▶ **K** - /Home page displaying product list for WooCommerce

It is also essential to understand that each type of site tested can generate very different response curves due to the nature of the sites

The tests performed on **Site A** - generate one php request.

The tests performed on **Sites D** and **F** - generate one php and 3 Ajax requests.

The tests performed on **Site J** - generate one heavy php request.

The tests performed on **Site K** - generate one moderate php request.

As such, comparing different site types is not a preferred option.

Concurrency

It is also important to understand how we look at the concept of concurrent users. In this test solution we are looking at maximal page requests per second but in a platform like buddyboss - request per second and concurrent users don't have a direct one to one relationship.

For a long time, a single BuddyBoss activity feed actually required FOUR page requests (main page, feed ajax , notification ajax , messages ajax)

And beyond this - every minute after a page was first loaded another TWO page requests (notification ajax and messages ajax) were triggered again.

The BuddyBoss app adds a further level of complexity due to the nature of how it works - which again until recently required a large number of ajax request (10-15) just to get the app started - and then potentially that many again to load different parts of the app - especially pages with lots of elements or blockli components.

This is also further complicated on slower sites and smaller plans where the amount of time required to actually create the 4 pages takes more than 3 seconds of processing time

For this reason when we look at most concurrent site recommendations we need to look at concurrency across a window of time (1-2 seconds of higher performance hosts and 3-5 seconds on slower hosts)

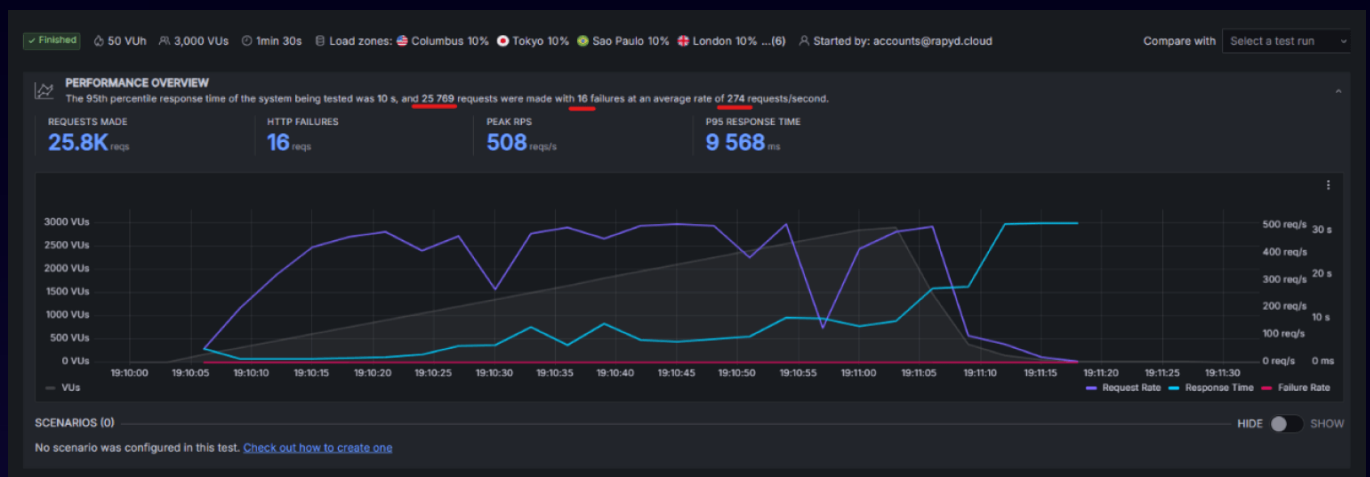
For load consistency we have performed all the buddyboss site tests - using the older methodology - as it covers the worst case scenarios - but can also be compared and contrasted with the TutorLMS based marks which represent a dynamic load without the additional ajax calls.

As such then we have TWO different metrics for Concurrency:

The first is True Concurrency, which is the number of requests that a server can handle per second, and the second is Platform Concurrency, which is the number of people who could theoretically be active on the same site at the same time—given that, in most cases, they are not ALL clicking to load a new page every second—or, for that matter, even being processed in a second due to the windows discussed above.

Reading the tests

As the test aims to probe the upper limits of what a server is capable of, we are monitoring several data points.



REQUESTS MADE - This measures the number of times K6 actually managed to get a response from the target server.

HTTP FAILURES - This measures the number of times K6 encountered an ERROR after the first connection.

In an ideal world - a server should be able to respond to ALL requests in a timely and efficient many and not generate any failures, But in the real world each server / plan has its logical limits and also each server has its own varied mechanisms of initial response and error handling as a result each test on each server environment needs to be read as an overall response - as opposed to a selection of individual data points.

The more **SUCCESSFUL** responses a server can handle in a minute, the more capable it should be of handling concurrent user requests on dynamic WordPress sites.

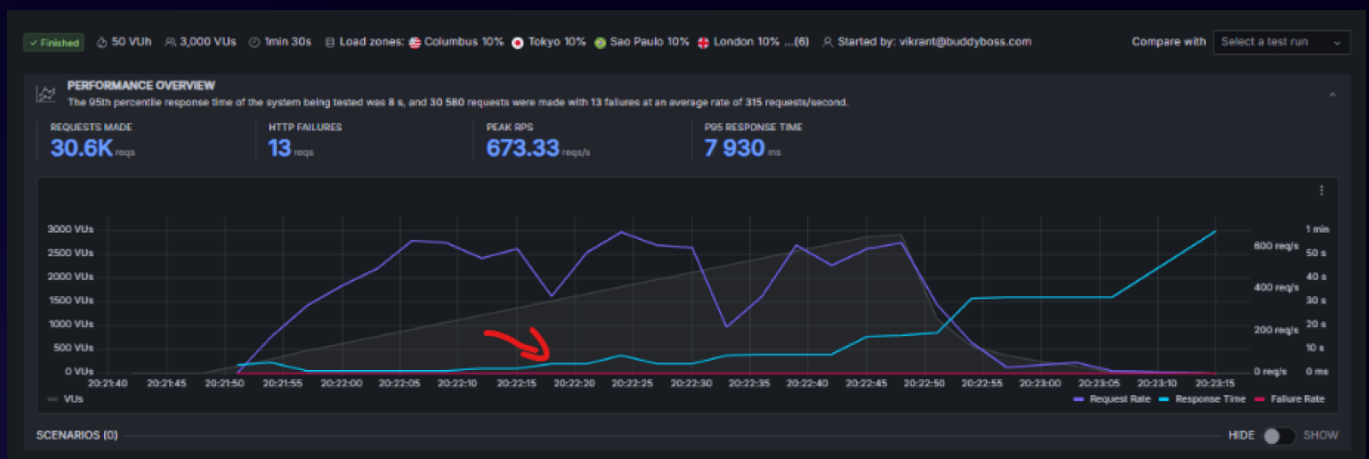
AVERAGE REQUESTS PER SECOND: This measures the number of requests the server can handle per second. The higher the average requests per second, the lower the error rates, the better.

These are simple takeaway metrics that should be evaluated against more visual data.

One of the most significant factors as we scale - is the ability of a server to keep responding - even under high loads.

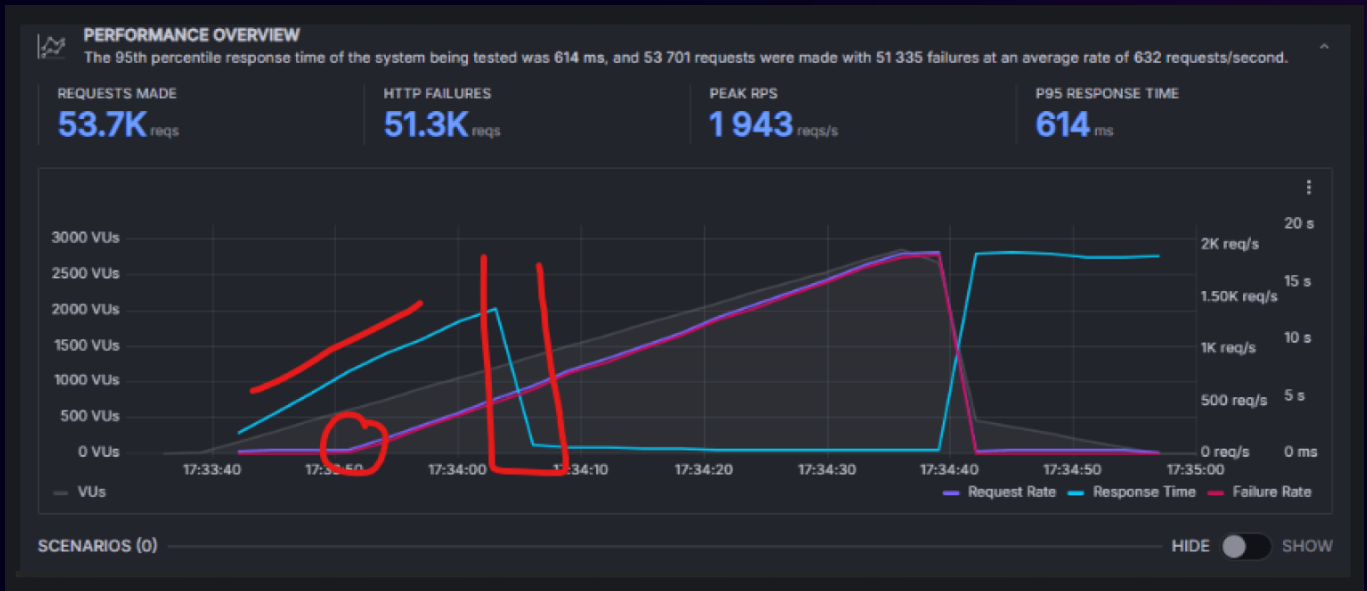
One of the most significant factors as we scale - is the ability for a server to keep responding - even under high loads.

EXAMPLE 1: In the example below, we see a slow ramp of the teal response time - as the load increases - the LiteSpeed Enterprise Rapyd server, in this case, is working hard to ensure that pages are still delivered within around 4 seconds even as the requests per second push thru the 400 count - with only 13 failures in 30k of achieved requests.



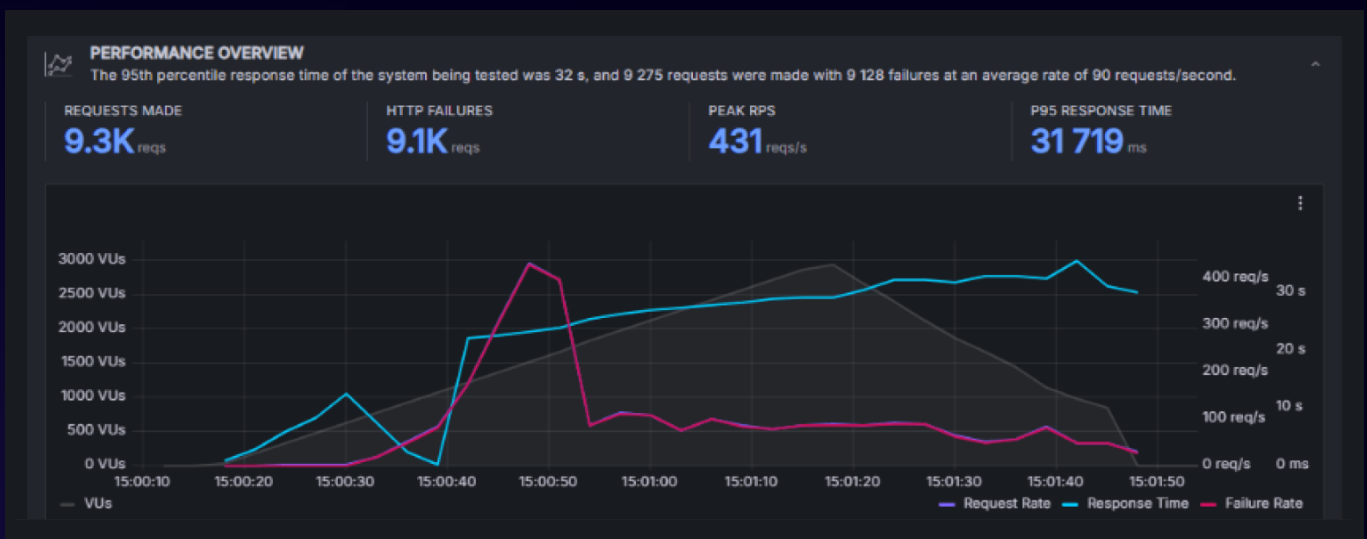
• K6 Results: Rapyd.cloud, Performance 3, Simple WP Site

EXAMPLE 2: While on the corresponding Kinsta plan, the response times break out to over 10 seconds and errors start occurring = at low request rates - before the server gives up entirely and stops serving pages effectively - with only some 2400 requests completed.

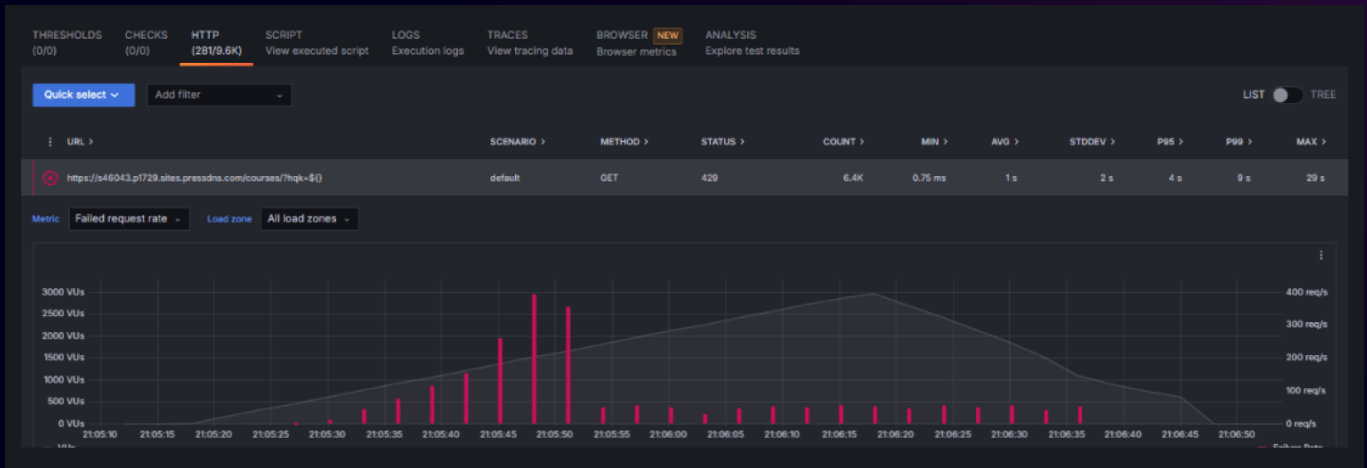


• K6 Results: Kinsta, Business 4, Simple WP Site

EXAMPLE 3: The following report is a Pagely site struggling, but it does show the actual crash of response times reflected in the above Kinsta chart. It appears to keep responding, but in all likelihood, it loads a page that is not fully rendered. In this case, what matters is when the errors start. In all these tests, we are looking for not only what is achieved but also the point at which the failures start.

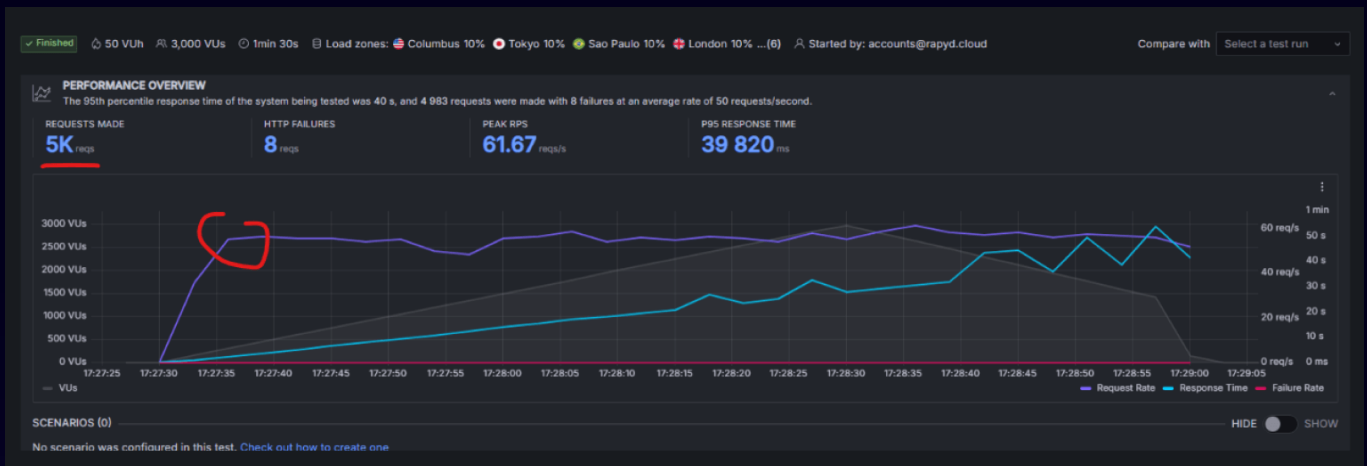


• K6 Results: Pagely, Performance, TutorLMS



- K6 Results: Pagely, Performance, TutorLMS

EXAMPLE 4: But also remember when looking at these charts that while this very large (Cloudways CO 4XL) AWS plan does not appear to have any errors, it will only process 5k requests in the minute due to the nature of how Apache servers respond to requests, and the request rate never actually exceeded around 62/second from very early in the test cycle.

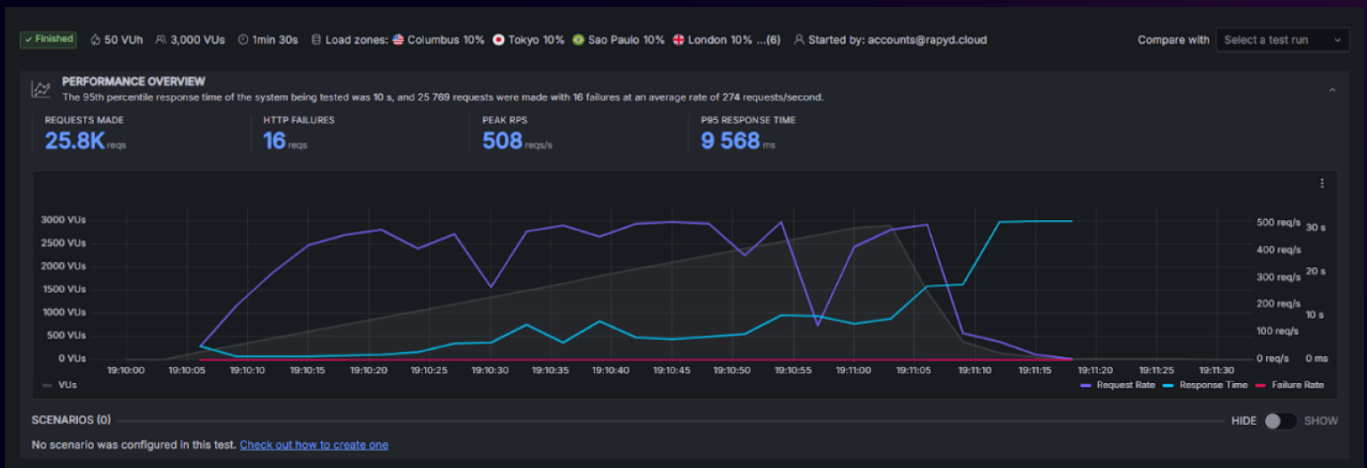


- K6 Results: Cloudways AWS, CO 4XL, Simple WP Site

Metrics Comparisons

Based on these metrics and tests and what we do know from our own modeling around concurrent user loads, the K6 testing produces similar and reasonably consistent results. Our internal concurrent user modeling is based on RAM and CPU allocations, which provides an estimate of available PHP workers per load per time window (again, around 2 seconds)

Based on our Rapyd.cloud modeling, we know that a Performance 1 plan has 292 PHP workers allocated when fully dynamically boosted. Assuming a window of 2 seconds, this plan is designed to handle around 145 requests per second.



- K6 Results: Rapyd.cloud, Performance 1, Simple WP Site

What these tests show is that on a BuddyBoss activity feed load, we are actually achieving a smaller processing window, which shows this environment can handle loads closer to 500 requests per second at full dynamic boost, at response rates consistent with a 2-second or better page presentation rate.

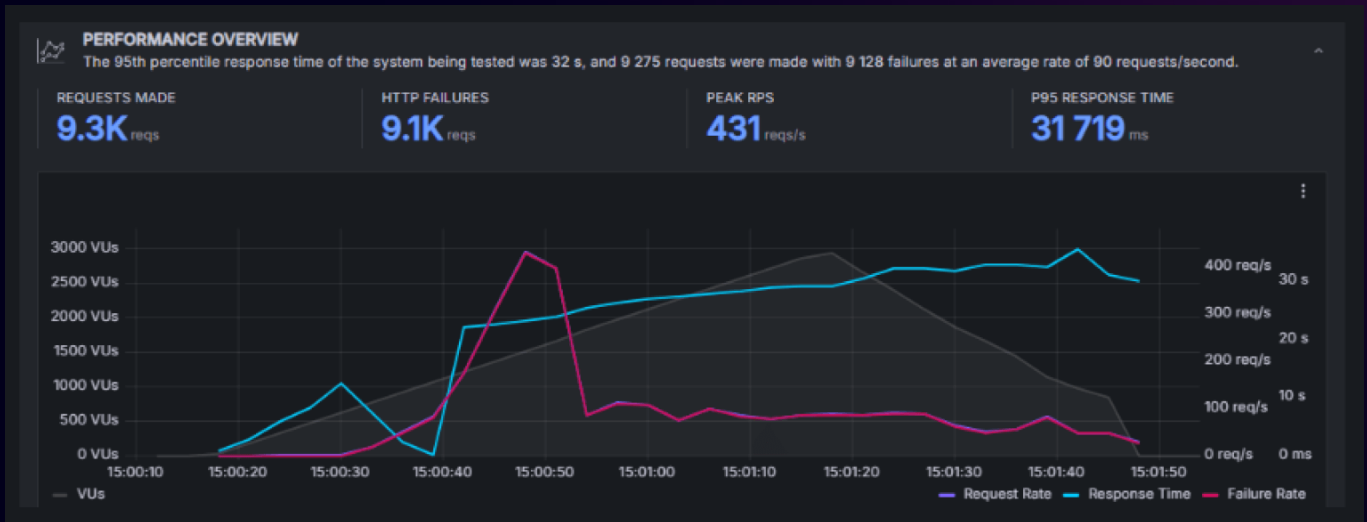
Even with a full load, this Performance 1 environment only triggered 16 errors and handled some 25,800-page requests across the testing load period.

In contrast - the similarly priced Digital Ocean instance - struggled to process 2000 requests with 259 errors in the same period - representing a ten times or more significant performance differential.

Platforms like Kinsta and Pagely produced very high error rates and poor response times.



- K6 Results: Kinsta, Business 3, Simple WP Site



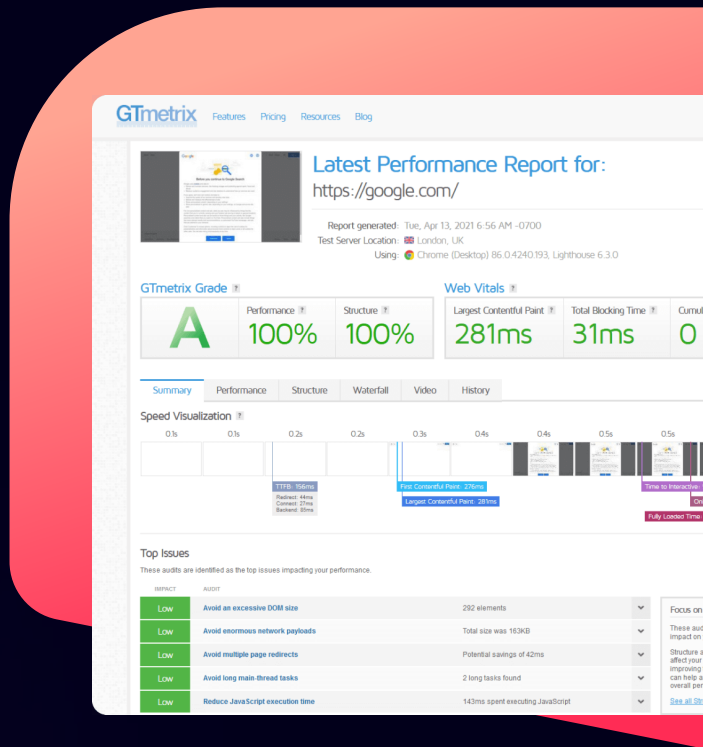
• K6 Results: Pagely, Performance, BuddyBoss Site with large database

- **What It Teaches Us:** Helps understand the scalability and reliability of the hosting server under stress, essential for websites with fluctuating traffic.

D GTmetrix Speed Test

GTmetrix analyzes the loading performance of websites, offering a comprehensive view of web performance. [Link to plugin](#)

- **Testing Methodology:**
 - ▶ Performance Analysis: Assesses page loading times, resource optimizations, and other performance metrics.
- **What It Teaches Us:** Provides a detailed analysis of the speed and efficiency of the hosting environment, crucial for user experience and SEO.



Server and Software Analysis

In addition to performance testing, our report includes a thorough examination of various server and software configurations used by the WordPress hosting providers. This analysis is crucial as it provides insights into the technological backbone that supports WordPress websites.

Web Server Software

- Analysis Objective: Identify and document the type of web server software used by each host (e.g., Apache, NGINX).
- Importance: Different web server software can have significant implications on how a website is served to users, affecting performance and scalability.
- Source: [We used the WP Server Stats plugin to gather this data.](#)

PHP Versions and Configurations

- Analysis Objective: Assess the version of PHP running on each server and explore the available options for upgrades or optimizations.
- Importance: PHP is a core scripting language for WordPress; its version and configuration play a key role in site performance, security, and compatibility with plugins and themes.
- Source: [We used the WP Server Stats plugin to gather this data.](#)

CPU Specifications

- Analysis Objective: Document the specific model and speed of the server's CPU for each hosting provider where possible.
- Importance: The server's CPU affects processing power, influencing the overall performance and responsiveness of a WordPress site.
- Source: [We used the commands `lscpu` and `cat/proc/cpuinfo` to get the CPU specifications.](#)

OPcache and Object Cache Technologies

- Analysis Objective: Evaluate whether OPcache is enabled and the process required to enable it. Assess the type of object cache technology used (e.g., Redis) and the availability and cost of associated plugins.

- Importance: Caching technologies like OPcache and object caching play a crucial role in enhancing WordPress performance by reducing the load on server resources, and the technology used can significantly impact the performance of dynamic WordPress sites.
- Source: For OPcache, the OPcache plugin was installed and our team checked the statistics to verify if the OPcache is available. For the Object Cache, we manually checked the platform to verify if the host is providing the Object Cache or not.

Database Software and Versions

- Analysis Objective: Compare the database software (e.g., MariaDB, Percona, MySQL) and versions used by each hosting provider. Assess the options available for upgrading these databases.
- Importance: The database software version can significantly impact the efficiency and speed of WordPress, affecting everything from query times to overall site reliability.
- Source: We used the **WP Server Stats** plugin to gather this data.

This server and software analysis aims to provide a comprehensive view of the technical environment in which WordPress sites operate on these hosting platforms. Understanding these aspects is essential for Dynamic WordPress site owners to make informed decisions about choosing a hosting provider that best fits their WordPress site's needs.

Analysis of Results

The cornerstone of our industry report is a detailed and objective analysis of the performance of each hosting provider. Our methodology involved conducting a uniform set of tests across all hosts, with the aim of gathering comprehensive performance data. The selection of these tests and the aspects we chose to analyze were specifically tailored to address the needs and challenges of hosting dynamic WordPress sites.

Emphasis on Dynamic WordPress Site Requirements

- Dynamic Content Handling: The core of our analysis centered on how well each hosting provider supports dynamic WordPress sites. Dynamic sites, unlike static ones, require robust and efficient handling of real-time content changes, user interactions, and frequent database queries.

- **Performance Metrics:** We evaluated key performance indicators that are critical for dynamic sites. This includes server response time, processing speed for PHP scripts, database query efficiency, and the ability to handle concurrent user requests without significant performance degradation.

Uniform Testing Across Hosts

- **Consistent Test Environment:** By performing the same tests on each hosting provider, we ensured that our comparison was fair and unbiased. This uniformity allowed us to draw direct comparisons between the hosts based on identical criteria.
- **Test Replicability:** The replicability of our tests is crucial for the validity of the results. The use of widely recognized and standard testing tools means that our tests can be independently verified, reinforcing the credibility of our findings.

Analysis Methodology

- **Quantitative Data Assessment:** We meticulously collected and analyzed quantitative data from the tests, focusing on measurable performance metrics.
- **Qualitative Considerations:** Alongside numerical data, we also considered qualitative aspects such as ease of use, customer support quality, and the availability of advanced features that are particularly beneficial for dynamic WordPress sites.

Interpretation of Results

- **Capability Spectrum:** Our analysis presents a spectrum of capabilities, showcasing how each hosting provider fares in supporting dynamic WordPress sites. This includes an assessment of how well they manage peak traffic, their efficiency in content delivery, and their resilience under load.
- **Comparative Insights:** The report not only provides individual assessments but also offers comparative insights, highlighting how each host stands in relation to others, particularly in areas critical for dynamic sites.

Implications for Users

- **Guidance for Site Owners:** The analysis aims to guide WordPress site owners in selecting a hosting provider that aligns with their specific needs, especially those operating dynamic sites.

This comprehensive analysis approach ensures that our report provides a deep understanding of how different WordPress hosting providers perform, particularly in the context of dynamic sites. Our findings are designed to be a valuable resource for anyone looking to make an informed decision about their WordPress hosting solution.

Transparency and Reproducibility

We emphasize transparency in our methodology. All tests can be replicated using the same third-party tools, allowing others to verify our results independently. This approach enhances the credibility of our findings and encourages further validation from the community.

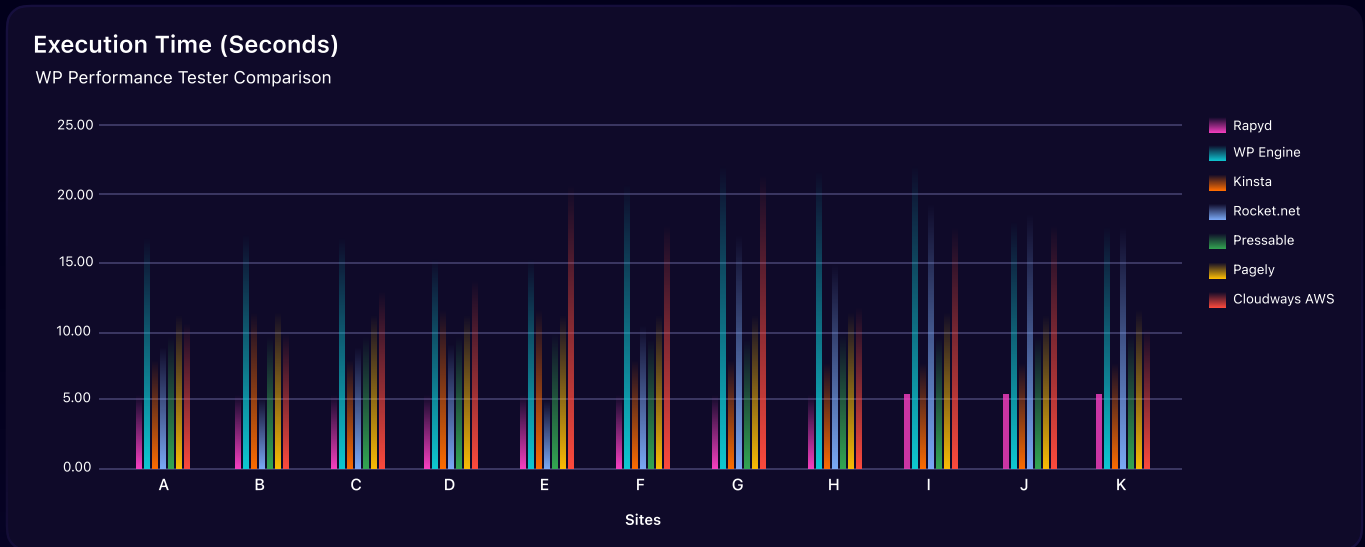
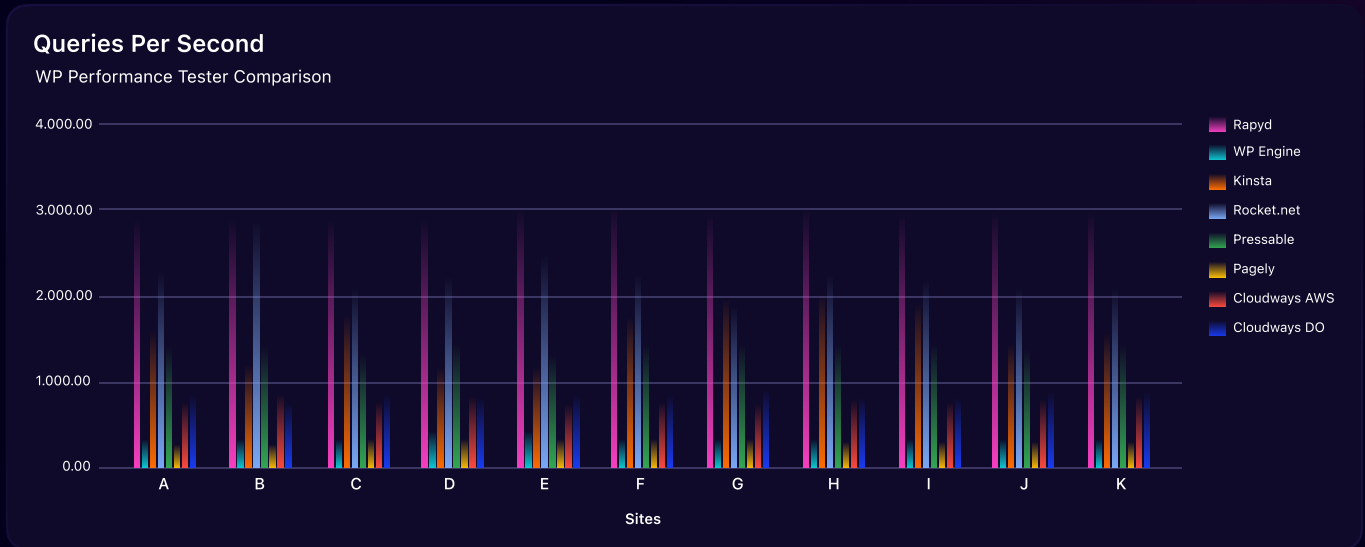
Quality Control and Reporting

To ensure reliability, each test was performed five times, with the report highlighting the best result out of these attempts. This approach guarantees the accuracy and consistency of our findings.



Host-by-Host Analysis Summary

WordPress Performance Tester

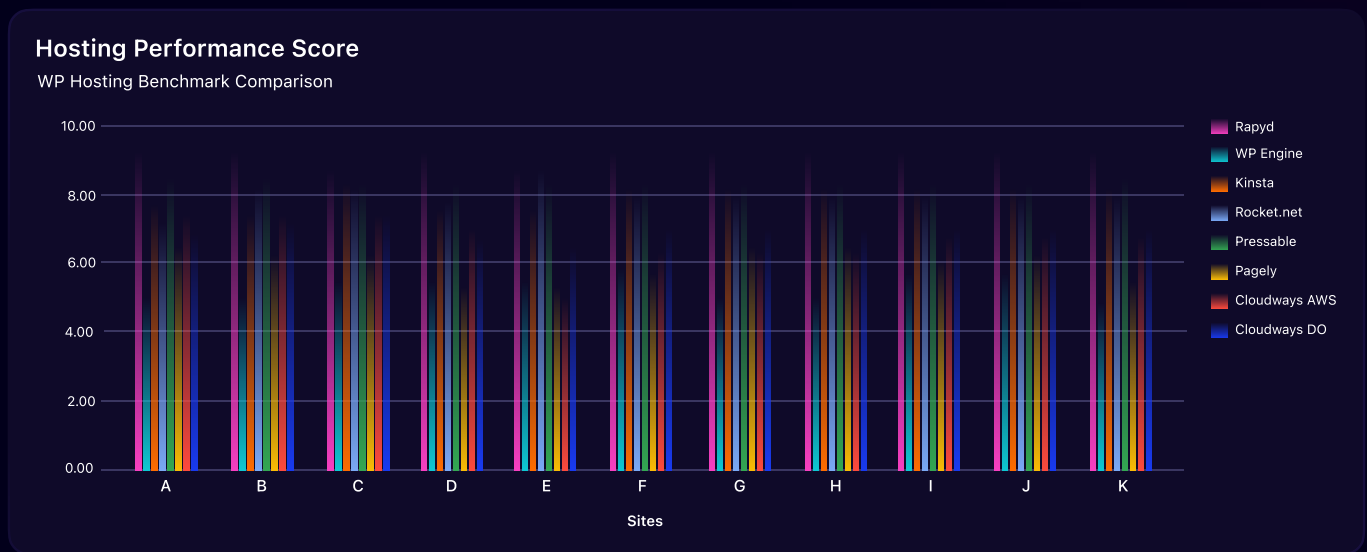


Comparative Analysis

In the **WordPress Performance Tester**, Rapyd stands out as the top performer with an average QPS of 2,944.84 and the lowest ET of 5.54 seconds, making it ideal for high-traffic and dynamic websites needing both robust query handling and fast execution times. Rocket.net also showed good performance with a QPS of 2,256.93 and a relatively low ET, though we were limited to testing only one plan on three sites before Rocket.net team requested we stop the test. Kinsta showed a good balance with a QPS of 1,621.45 and an average ET of around 8 seconds, suitable for medium to high-traffic sites, particularly static to medium level dynamic WordPress sites.

WP Engine and Pagely showed higher ETs (18.71 and 11.42 seconds respectively) and lower QPS, making them less suitable for very dynamic or high-traffic websites. Pressable, Cloudways AWS, and Cloudways DO offered moderate performance, with Pressable having a QPS of 1,396.55 and ET of 9.86 seconds, while Cloudways AWS and DO had slightly higher ETs and moderate QPS, suitable for moderately busy sites.

WP Hosting Benchmark



Comparative Analysis

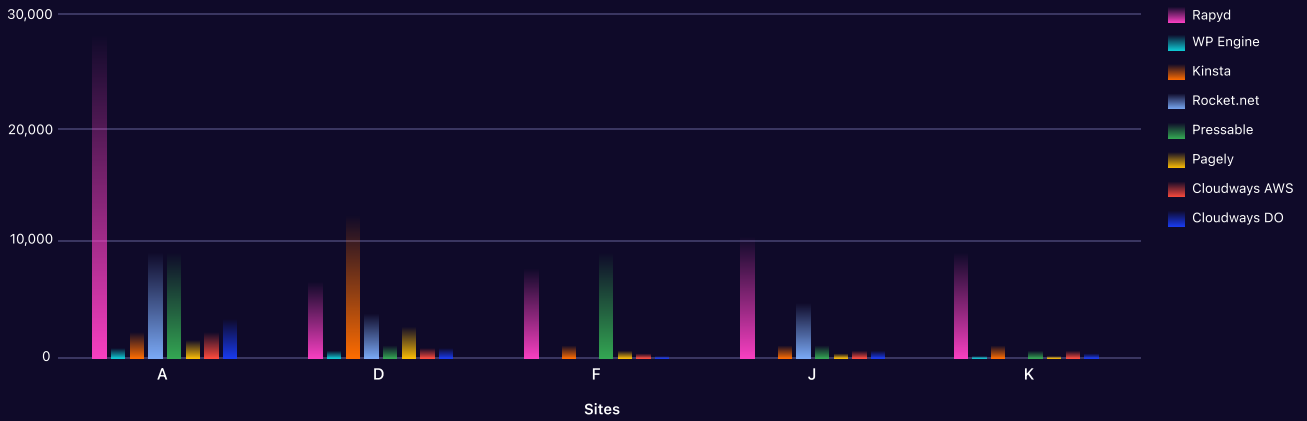
Rapyd leads with an impressive average score of 9.17, excelling in CPU, memory bandwidth, disk speed, persistent object cache, and network download speed, making it ideal for high-performance hosting needs. Rocket.net also performed strongly with an average score of 8.14, though as we shared above, that we were limited to testing only one plan on three sites before Rocket.net requested we stop.

Kinsta shows balanced performance with an average score of 7.75, suitable for medium to high-traffic WordPress sites, but not the most dynamic ones. Pressable scores well at 8.49, making it another solid choice for moderately demanding websites. WP Engine and Pagely lag behind with average scores of 5.25 and 6.02, respectively, indicating potential weaknesses in critical areas. They should be able to handle low-demand sites pretty well but struggle with highly-dynamic sites.. Cloudways AWS and Cloudways DO offer moderate performance with average scores of 6.88 and 7.09, respectively making them suitable for moderately demanding sites.

K6 Results

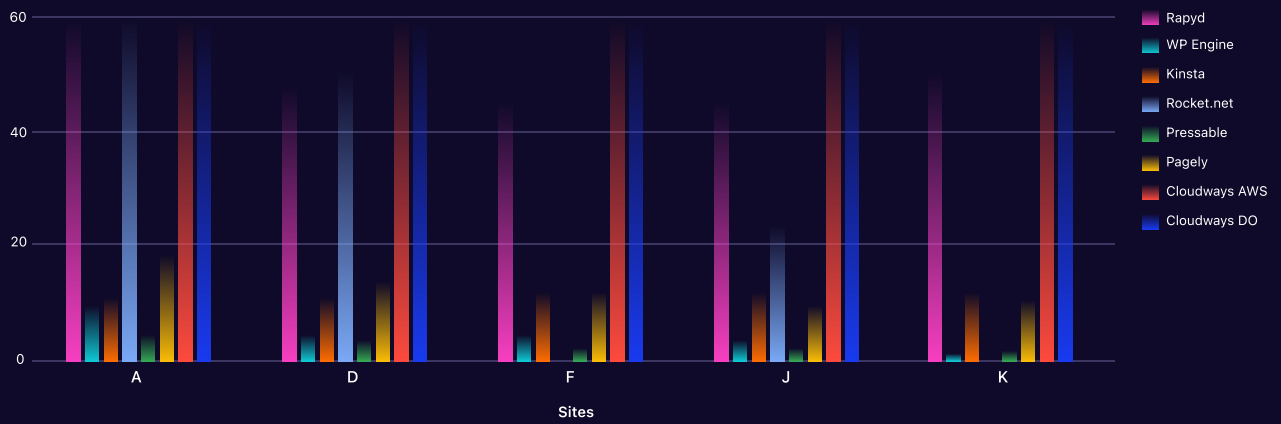
Request Completed (in 60 Seconds)

K6 Load Test Comparison



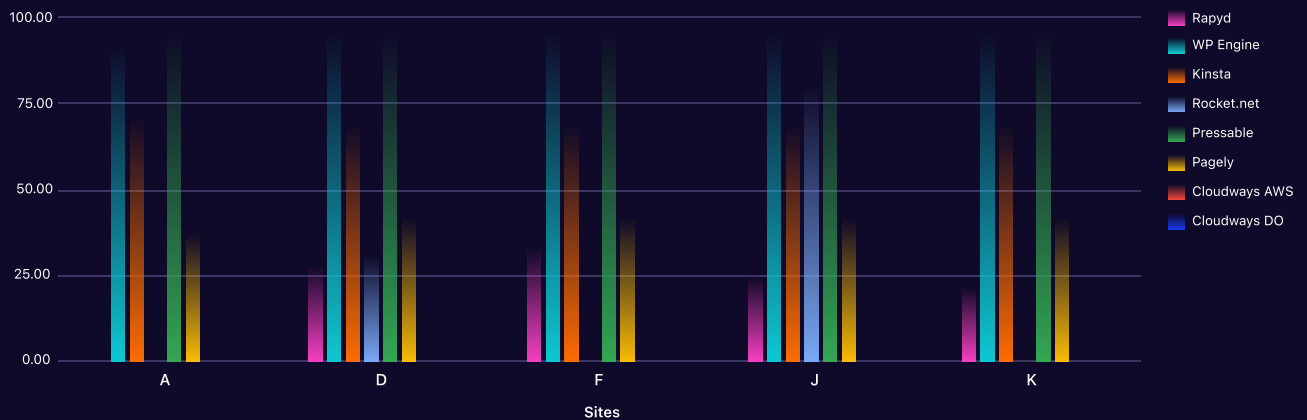
1st Error Max Window

K6 Load Test Comparison



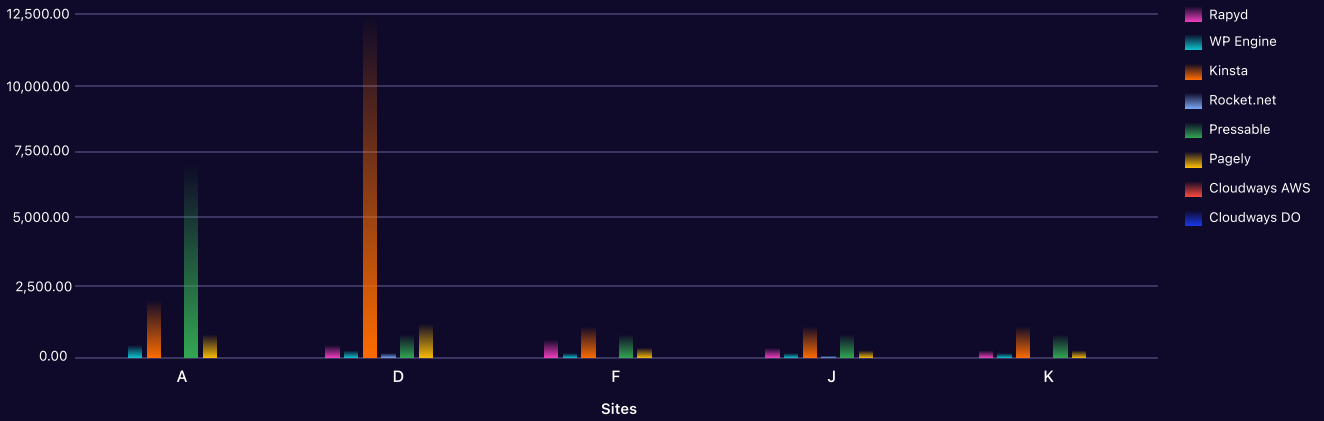
Normalised Error Percentage

K6 Load Test Comparison



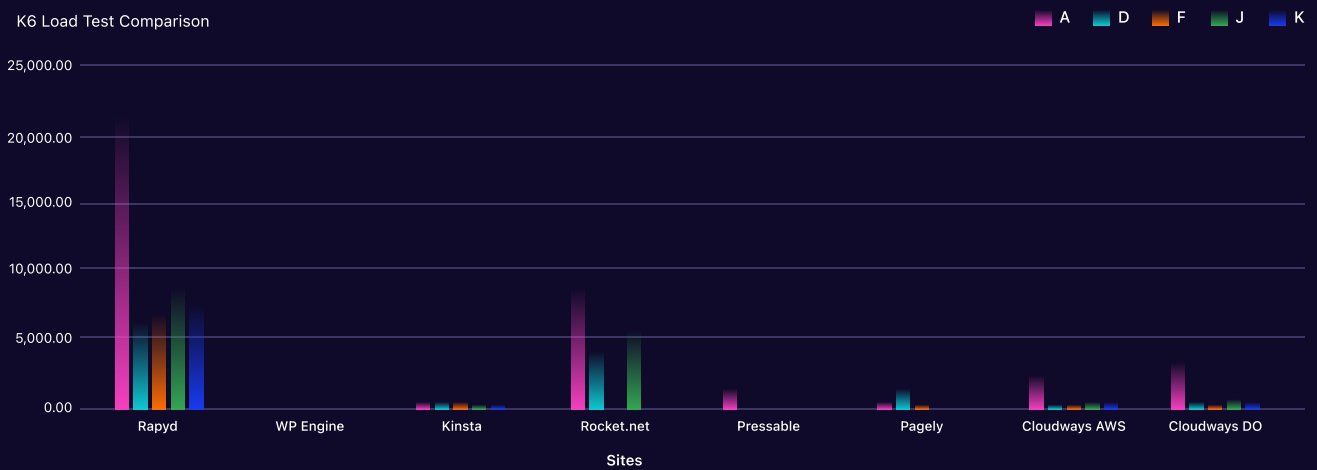
Error Weight

K6 Load Test Comparison



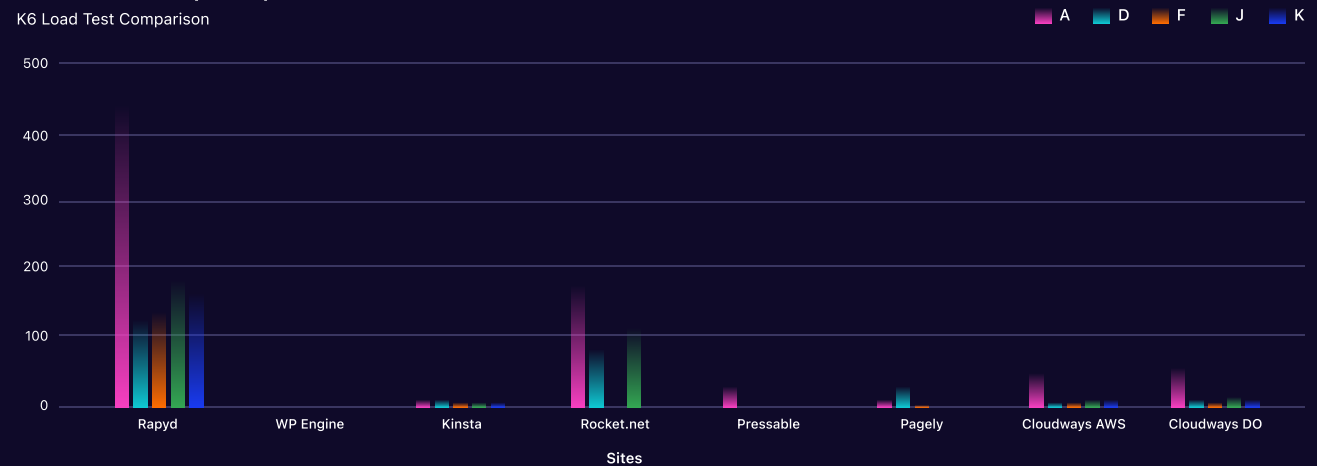
Normalized

K6 Load Test Comparison



Normalized Requests/Sec.

K6 Load Test Comparison

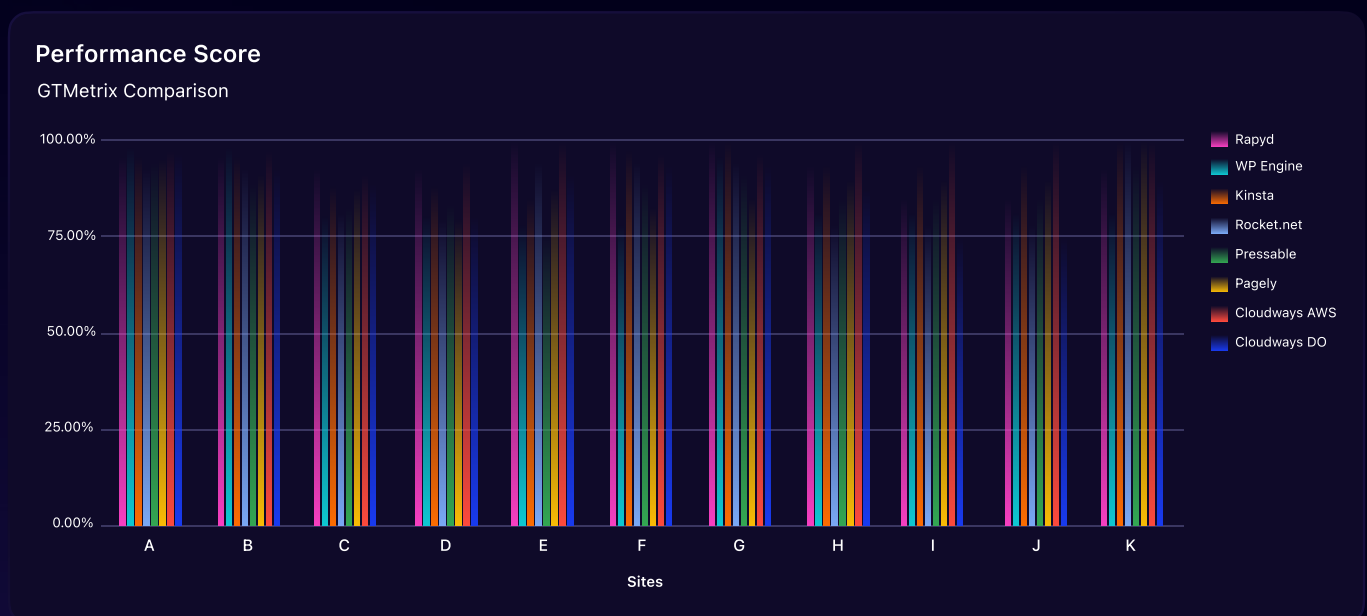


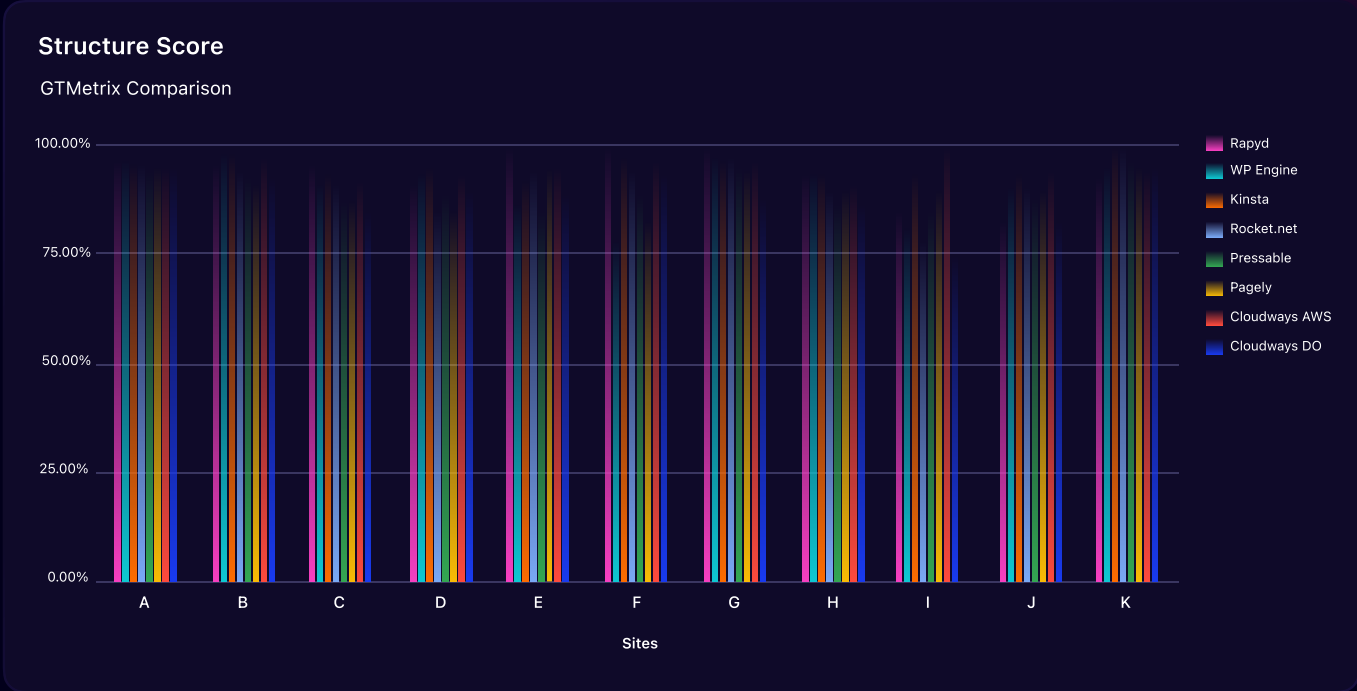
Comparative Analysis

Rapyd consistently outperformed other hosting providers in K6 load testing, demonstrating superior capability to handle high traffic and dynamic content on small hosting plans. For instance, Rapyd completed 27,033 requests on Site A with no errors in a 60-second window, while WP Engine and Kinsta experienced significant failures early on. Rapyd's dynamic scaling ensures high performance under load, with minimal errors even as demands increase. Rocket.net also shows strong performance, completing 8,553 requests on Site A without errors, though testing was limited due to restrictions from the provider.

WP Engine and Kinsta struggle with high error rates and lower request completions across all sites. WP Engine often reported errors within the first few seconds, indicating challenges in handling dynamic loads on smaller plans. Pressable falls into a mid-range category, with moderate request completions and higher error percentages. Pagely also showed limited capability under load, with consistently high error rates and lower performance metrics. Cloudways (AWS and DO) did not have much error percentage, but they have one of the poorest request completion rate, making the sites very slow.

GTMetrix Test





Comparative Analysis

Cloudways AWS and Digital Ocean hosting consistently scored high in GTMetrix performance and structure, often exceeding 97%, making them ideal for sites needing fast load times and high stability. Rapyd performs well overall but dips on Sites I and J, suggesting it handles typical loads efficiently but may struggle under specific conditions. WP Engine shows variability, excelling in some scenarios with scores of 99% but falling significantly in others, indicating potential issues with complex setups. Kinsta maintains reliable performance in the mid to high 90s, suitable for most users, though it may have occasional drops with dynamic content.

Rocket.net is robust, typically scoring around 98%, but may face limitations with very high complexity sites like Site D. Pressable and Pagely show varied results; Pressable dips to 75.33% on Site E, indicating it might not handle complex or large-scale sites well, while Pagely's inconsistent scores (81% to 100%) suggest potential reliability issues. Overall, Cloudways AWS and DO are top performers for reliability and speed, WP Engine and Kinsta are good for specific scenarios, and Rapyd is a solid all-rounder with some variability.

Host-by-Host Analysis



Rapyd

Show Test Results →



WP Engine

Show Test Results →



Kinsta

Show Test Results →



Rocket.net

Show Test Results →



Pressable

Show Test Results →



Pagely

Show Test Results →



Cloudways AWS

Show Test Results →



Cloudways DO

Show Test Results →

Feature-Based Comparisons

Server Software, Model, and Configurations:

SERVER OVERVIEW

HOST	SERVER OS	SERVER SOFTWARE
Rapyd	ALMALINUX 9.3	LITESPEED ENTERPRISE
WPengine	LINUX / 64BIT OS	APACHE
KINSTA	LINUX / 64BIT OS	NGINX / 1.25.2
Rocket.net	LINUX / 64BIT OS	APACHE
Pressable	LINUX / 64BIT OS	NGINX (KUBINETTES)
Pagely	LINUX / 64BIT OS	APACHE
CLOUDWAYS by DigitalOcean	LINUX / 64BIT OS	APACHE 2.4.57 (DEBIAN)
CLOUDWAYS by DigitalOcean	LINUX / 64BIT OS	APACHE 2.4.57 (DEBIAN)

Server OS and Software:

1. Rapyd (AlmaLinux 9.3 with LiteSpeed Enterprise):

- **LiteSpeed Enterprise**, excels in server response times, handling more requests per second with superior resource management and faster data transfer, ensuring your site operates at peak efficiency.

2. WP Engine, Rocket.net, Pagely, Cloudways (Apache):

- **Apache** servers, excels in server response times, handling more requests per second with superior resource management and faster data transfer, ensuring your site operates at peak efficiency.

3. Kinsta, Pressable (nginx):

- **NGINX**, offers a noticeable improvement over Apache, making it a better choice for efficiency. However, OpenLiteSpeed takes it a step further with even superior performance. But the top contender remains LiteSpeed Enterprise.

PHP Version and Settings:

1. PHP Version:

- Newer versions of PHP have better performance. PHP 8 performs much better than PHP 7 or previous versions. WordPress can perform 10-25% faster on PHP 8, than other versions. Upgrading is also critical to avoid security issues. Newer PHP versions include fixes for security issues, reducing the risk of hacks and data breaches.

2. PHP Max Upload Size, Max Execution Time, Memory Limit:

- These settings determine how well the server can handle large files and long-running scripts. Higher values can support more demanding applications but require more server resources.

OPcache and Object Cache Analysis:

Benefits of OPcache for WordPress Performance

- **Speeds Up PHP Execution:** OPcache improves PHP performance by storing precompiled script bytecode in shared memory, reducing the need for PHP to load and parse scripts on each request.
- **Reduces Server Load:** By eliminating the repetitive compilation of PHP scripts, OPcache significantly reduces server load, which is particularly beneficial for high-traffic WordPress sites.
- **Enhances Response Time:** Websites experience faster response times as scripts are served from the cache rather than being recompiled each time, leading to a more responsive user experience.

Benefits of Object Cache for WordPress Performance

- **Decreases Database Load:** Object caching reduces the need for frequent database queries by storing the results of data fetches in memory. This is especially useful for WordPress sites that rely heavily on database interactions.
- **Improves Page Load Times:** Cached objects are retrieved much faster than data that requires a database query, which can substantially decrease page load times.
- **Scales for High Traffic:** Object caching is essential for scaling WordPress sites to handle large volumes of traffic without degradation in performance, as it allows for efficient data retrieval even under heavy load.

Host's Implementation

Overview of Technologies

OPCache

OPcache is a built-in PHP caching engine that significantly boosts website performance by storing precompiled script bytecode in shared memory. This eliminates the need for PHP to load from the disk and parse scripts with every request, enhancing efficiency and speed. This is a must have for dynamic WordPress sites as it can dramatically affect performance.

Allocated memory to OPcache is crucial because it determines the amount of precompiled PHP script bytecode that can be stored. This directly impacts the efficiency and speed of PHP execution on your website. More allocated memory allows for more scripts to be cached, which means faster page load times and improved overall performance.

Redis Object Cache:

Function: Redis is an in-memory data structure store used as a database, cache, and message broker. It is often used to cache objects to speed up dynamic web applications by reducing the need to access the database frequently.

Impact: Enhances performance by reducing database load and speeding up data retrieval times, which is crucial for handling high traffic and dynamic content.

Other Object Cache (Memcached):

Function: Memcached is another in-memory key-value store for small chunks of arbitrary data (strings, objects) from results of database calls, API calls, or page rendering.

Impact: Similar to Redis, it improves performance by caching data and reducing the load on the database, though it lacks some of Redis's advanced data structures and persistence features.

HOST	OPCACHE	REDIS OBJECT CACHE	OTHER OBJECT CACHE	IMPACT
Rapyd	Yes	Yes		Rapyd leverages both OPcache and Redis Object Cache, providing a robust caching mechanism that enhances script execution speed and reduces database load, resulting in highly optimized performance for dynamic WordPress sites.
WP Engine	No	No		The absence of OPcache and Redis Object Cache might lead to slower script execution and higher database load, potentially resulting in slower performance under high traffic conditions.
Kinsta	Yes	No		With OPcache enabled, Kinsta benefits from faster PHP execution. However, the absence of Redis means database load might not be as optimized as it could be, possibly affecting performance under heavy database queries.
Rocket.net	Yes	Yes		Similar to Rapyd, Rocket.net's use of both OPcache and Redis Object Cache ensures quick PHP script execution and reduced database load, leading to good performance for dynamic content.
Pressable	No	No		Without OPcache, PHP script execution might be slower. However, the use of Memcached helps in reducing database load, although not as efficiently as Redis.
Pagely	Yes	Yes	Yes (Memcached)	Pagely's use of both OPcache and Redis Object Cache ensures that PHP scripts execute quickly and database queries are minimized, providing a high-performance environment for WordPress sites.
Cloudways AWS	Yes	Yes		Cloudways AWS benefits from both OPcache and Redis Object Cache, offering fast PHP execution and reduced database load, which is crucial for maintaining high performance under heavy traffic.
Cloudways DO	Yes	Yes		Similar to Cloudways AWS, Cloudways DO utilizes both OPcache and Redis Object Cache to enhance PHP execution speed and reduce database load, ensuring optimal performance.

DATABASE ANALYSIS	
HOST	SOFTWARE
Rapyd	MariaDB 10.6.16
WP Engine	Percona 8.0.35 Percona 8.0.36
Kinsta	mariadb.org 10.11.6, mariadb.org 10.11.7
Rocket.net	MySQL 8.0.36, MariaDB 10.11.7
Pressable	MariaDB 10.6.17, MariaDB 10.6.15
Pagely	Source 8.0.28
Cloudways AWS	mariadb.org 10.5.24
Cloudways DO	mariadb.org 10.5.24, mariadb.org 10.5.22

While any of these database management systems (DBMS) are capable of supporting WordPress, it is generally better to keep your database software updated to the latest stable versions. This ensures you benefit from the latest performance enhancements, security updates, and bug fixes.

Impact on WordPress Performance

1. MariaDB:

- **Performance:** MariaDB is a fork of MySQL and is known for its improved performance, especially for complex queries and high-concurrency environments. It can handle larger datasets efficiently and provides better overall speed.
- **Compatibility:** Fully compatible with MySQL, ensuring smooth operation with WordPress plugins and themes that require MySQL.

2. Percona:

- **Performance:** Percona Server is optimized for performance and reliability. It offers advanced features like enhanced monitoring, better concurrency handling, and improved backup solutions.
- **Compatibility:** Fully MySQL-compatible, ensuring that all WordPress features work seamlessly.

3. MySQL:

- **Performance:** MySQL is widely used and supported, offering reliable performance for WordPress sites. The 8.0 series has significant improvements in terms of performance, security, and stability.
- **Compatibility:** As the default DBMS for WordPress, it guarantees full compatibility with all WordPress features.

Conclusion and Recommendations

This report has analyzed several WordPress hosting providers, evaluating their performance using various metrics, including server performance benchmarks, WordPress performance execution times, queries per second, and K6 load testing. The key insights from the analysis are as follows:

- **Rapyd:**
 - ▶ Consistently strong performance across all metrics.
 - ▶ Robust infrastructure capable of managing high traffic and dynamic content efficiently.
- **WP Engine:**
 - ▶ Significant variability in performance.
 - ▶ Performs well in some areas but struggles under high loads and complex configurations.
- **Kinsta:**
 - ▶ Solid performance, particularly in handling dynamic content.
 - ▶ Shows some vulnerability under continuous heavy loads.
- **Rocket.net:**
 - ▶ Good overall performance.
 - ▶ Faces challenges with the most complex and high-traffic environments.
- **Pressable:**
 - ▶ Moderate capabilities.
 - ▶ Handles standard web applications well but struggles under heavy stress.
- **Pagely:**
 - ▶ Mixed performance.
 - ▶ Good results in specific enterprise contexts but inconsistent under heavy load.
- **Cloudways AWS and Cloudways DO:**
 - ▶ Moderate capabilities.
 - ▶ Handles standard web applications well but struggles under heavy stress.

Recommendations

Based on the findings, Rapyd emerges as a highly reliable choice for websites anticipating high traffic and dynamic content, such as large e-commerce platforms and popular blogs. Its robust infrastructure ensures sustained performance under heavy loads, making it a versatile and strong option for the most demanding WordPress environments.

WP Engine, while optimized for standard WordPress setups, is recommended for simpler WordPress sites where traffic is more predictable and less intense. It may not be suitable for highly dynamic or resource-intensive sites due to variability in performance under complex conditions.

Kinsta is a good choice for medium to high-traffic websites, particularly those with dynamic content. Its strong performance in handling dynamic loads makes it suitable for corporate sites and larger blogs, though very high-traffic scenarios may require additional optimization.

Rocket.net excels in handling moderate to high traffic, making it ideal for dynamic websites and online stores, but it may struggle with extremely complex environments.

Pressable is best suited for small to medium-sized sites with less intensive demands, maintaining good performance under moderate conditions but not handling very high traffic or dynamic content well.

Pagely is recommended for specialized enterprise-level sites needing specific solutions. However, its inconsistent performance in handling heavy loads makes it less suitable for highly dynamic or high-traffic environments.

Cloudways AWS demonstrates mixed performance, often falling below the industry average in QPS while maintaining ET around the industry average, making it ideal for less demanding websites like corporate sites and medium-sized blogs.

Cloudways DO shows similar performance, handling moderate traffic efficiently but facing challenges with high traffic and dynamic content, making it more suitable for corporate sites and medium-sized blogs with predictable traffic.

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Glossary

WordPress Hosting Benchmarking Tool

- This tool, [WordPress Hosting Benchmarking Tool](#), evaluates the performance of your WordPress hosting environment. It conducts a series of tests to measure the response time and capacity of your server, providing insights into how well your hosting can handle WordPress-specific tasks.

WordPress Performance Tester

- The [WordPress Performance Tester](#) plugin assesses your WordPress site's performance. It runs a series of tests to check the speed and efficiency of your WordPress environment, including server response times and database operations, helping identify areas for performance improvement.

K6 Load Testing:

- K6 Load Testing is a tool that simulates varying levels of user traffic to evaluate server performance under different load conditions. It helps identify how well a hosting environment handles high traffic and user interactions by generating increasing page requests over time. This testing is essential for understanding a server's scalability, reliability, and ability to maintain performance during peak traffic periods.

GTMetrix:

- GTMetrix is a web performance analysis tool that evaluates website loading speed and efficiency. It provides detailed insights into page loading times, resource optimization, and overall site performance. By identifying areas for improvement, GTMetrix helps enhance user experience and SEO rankings, ensuring websites load quickly and efficiently across different devices and network conditions.

- **Dynamic content:** Content on a website that changes based on user interaction or other variables.
- **Enterprise-level:** Pertaining to large organizations with complex needs, requiring robust and scalable solutions.
- **Error onset:** The point at which errors begin to occur in a system under load.
- **Filesystem:** The method and structure an operating system uses to name, store, and organize files on a disk.
- **Infrastructure:** The underlying framework or foundation of a system or organization, including hardware, software, and networks.
- **Interactive digital format:** A digital document or content that allows user interaction, such as clicking or navigating.
- **Litespeed:** A high-performance web server known for its speed and efficiency in handling web traffic.
- **Math functions:** Operations or calculations performed using mathematical principles, often used in programming and databases.
- **Memory efficiency:** The effective use of memory resources in a computing system.
- **Network connectivity:** The state of being connected to a network, allowing communication between devices.
- **Object cache:** A system that stores frequently accessed objects in memory to improve performance.
- **Optimization:** The process of making something as effective or functional as possible.
- **Page requests:** The act of a user's browser asking for a web page from a server.
- **Performance degradation:** The decline in performance or efficiency of a system over time or under load.
- **Persistent object cache:** A caching system that retains cached objects across sessions and server restarts.
- **PHP (Hypertext Preprocessor):** A popular server-side scripting language used for web development.
- **Plugin:** A software add-on that enhances the functionality of a main program.
- **Profiling:** Analyzing the performance of a system or application to identify bottlenecks and improve efficiency.

- **Queries per second (QPS):** The number of queries a hosting server can handle in one second.
- **Execution Time (ET):** The amount of time it takes for a script or process to complete its execution.
- **1st Error Max Window:** The time duration at which the first error is observed under load testing.
- **Normalized Error Percentage:** The error rate adjusted to a common scale for comparison across different systems or conditions.
- **Error Weight:** A metric used to quantify the impact or severity of errors during testing.
- **Normalized:** Adjusted values scaled to a common standard for fair comparison.
- **Normalized Req./Sec.:** The number of requests per second normalized to a common standard for consistent comparison across different tests.
- **Bandwidth:** The amount of data that can be transmitted over a network in a given amount of time.
- **Benchmark:** A standard or point of reference against which things may be compared or assessed.
- **Brochure sites:** Simple websites that provide basic information about a business or service, similar to a digital brochure.
- **Caching:** The process of storing data in a cache, or temporary storage area, for quick access.
- **CDN (Content Delivery Network):** A network of servers that distribute content to users based on their geographic location to improve loading speed.
- **Concurrency:** The ability of a system to handle multiple operations or transactions simultaneously.
- **Configurations:** The arrangement of components or settings in a system or software.
- **CPU (Central Processing Unit):** The primary component of a computer that performs most of the processing inside a computer.
- **Database efficiency:** The effectiveness of a database in terms of speed, storage, and query handling.

- **Replicability:** The ability of a test or experiment to be repeated with the same results.
- **Request per second:** The number of requests a server can handle in one second.
- **Resilience:** The ability of a system to recover quickly from difficulties or adapt to changes.
- **Scalability:** The capacity of a system to handle growth or increased demand by adding resources.
- **Server response time:** The amount of time it takes for a server to respond to a request from a client.
- **Speed optimization:** Techniques used to improve the loading speed of a website or application.
- **Stress test:** Testing a system's performance under extreme conditions to identify its limits.
- **Third-party testing tools:** Tools developed by external companies used to test and analyze systems.
- **Throughput:** The amount of data processed by a system in a given amount of time.
- **Traffic demands:** The volume of users or data a system must handle.
- **Uniform testing:** Conducting tests in a consistent manner across different systems to ensure comparability.
- **Workload:** The amount of work or processing a system must handle at any given time.
- **APM (Application Performance Monitoring):** Tools and processes used to monitor and manage the performance of software applications.
- **LMS (Learning Management System):** Software used to deliver, track, and manage training and education.
- **SEO (Search Engine Optimization):** The practice of enhancing a website to improve its visibility in search engine results.
- **API (Application Programming Interface):** A set of rules and protocols for building and interacting with software applications.